


Spring May 10th, 2018

The Association of Attachment and Marital Satisfaction Mediated by Implicit Theories of Relationships

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The Association of Attachment and Marital Satisfaction Mediated by Implicit Theories of
Relationships

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A dissertation submitted in partial fulfillment

Of the requirements for the degree of

Doctor of Philosophy

In

Clinical Psychology

Seattle Pacific University

School of Psychology, Family, and Community

May 10, 2018

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Abstract

Sadie M. Teal
Word Count: 344

This study explored the association between adult attachment, implicit theories of relationships, and marital satisfaction for adults who are currently in a romantic relationship. Attachment needs influence the lasting relationships individuals have in their lives, from infancy to adulthood. Secure attachment facilitates lasting relationships. Implicit theories around romantic relationships motivate our behaviors in relationships to fit our cognitive schemas. Due to attachment's pervasive hold on our perceptions of the world and others, the relationships we have with significant others influence our cognitive schemas around romantic relationship dynamics. It was hypothesized that attachment (the independent variable) would affect marital satisfaction (the dependent variable), and that implicit theories of relationships (destiny and growth belief) would indirectly affect that relationship.

Data was gathered from 82 participants. Participants included 11 males and 71 females with the mean age of 33.95 years, who endorsed currently being in a serious romantic relationship. The participants were assessed for attachment anxiety and avoidance using the Experience of Close Relationships – Revised (ECR-R) measure, implicit theories of relationships using the Implicit Theories of Relationships scales (ITRs), and marital satisfaction using the Dyadic Adjustment Scale (DAS). PROCESS Macro's test of parallel multiple regression analysis was used to test the associations among the three primary variables. Results demonstrated a significant negative relationship between attachment anxiety/avoidance and marital satisfaction ($b = -7.65, p < .001$; $b = -10.05, p < .001$, respectively). Results indicated implicit theories of relationships having a nonsignificant indirect effect on the relationship between attachment and marital satisfaction. In post hoc analyses, destiny belief was found to significantly moderate the

relationship between attachment avoidance and marital satisfaction ($\Delta F(1, 78) = 4.56, \Delta R^2 = .03, p < .05$). In general, this research suggests that individuals with insecure attachment report lower levels of marital satisfaction. In addition, it appears that having high destiny beliefs about relationships could strengthen the negative relationship between attachment avoidance and marital satisfaction so that reported levels are lower than if the individual had lower levels of destiny beliefs.

Keywords: Implicit Theories of Relationships, Attachment, Marital Satisfaction, Couples, Adulthood (18 yrs & older)

CHAPTER I

Introduction

The purpose of this study was to examine the relationship between attachment and marital satisfaction and the indirect effect of implicit theories of relationships between the two variables. It was hypothesized that attachment would have a direct effect on marital satisfaction, supporting previous research (Chung, 2014; Karantzas, Feeney, Gonclaves, & McCabe, 2014; Towler & Stuhlmacher, 2013), and that implicit theories of relationships would indirectly affect this association. Marital satisfaction is a rich field of research and clinical practice in the field of psychology. The impact of marital discord and relationship instability has been recognized to not only predict individual psychopathology (Thoburn & Sexton, 2016), but also effects on the community (Bradbury, Fincham, & Beach, 2000). Before examining these hypotheses further and proposing a method of study and analysis, it will be helpful to have a greater understanding of the constructs that were examined in this research.

Humans are social creatures and demonstrate the need for interdependence from infancy, displaying proximity seeking behaviors to bond with caregivers (Bowlby, 1969). Attachment theory postulates that these early behaviors continue throughout life and help form our understanding of relationships, specifically whether we can trust the people around us to meet our needs. These behavioral patterns grow from emotional experiences with caregivers during childhood and continue to build on each other into adulthood to form expectations for interpersonal interactions and relationships (Fraley & Shaver, 2000). Research has recognized two dimensions of attachment: avoidance and anxiety. Avoidant attachment is associated with discomfort regarding intimacy or closeness with others; anxious attachment is associated with a vigilance and concern regarding abandonment and loss (Fraley & Shaver, 2000). The degree to

which individuals demonstrate high or low levels for both anxiety and avoidance influences how he or she interacts within interpersonal relationships.

While attachment has a global influence on each individual in a dyad, implicit theories of relationships speak to the cognitive and motivating factors that influence relationship maintenance. Implicit theories focus on people's understandings of the malleable or fixed qualities of an individual's characteristics such as intelligence and personality. It was not until recently that implicit theory expanded into the exploration of an individual's fixed or malleable cognitive schemas around romantic relationships (Knee, 1998). Implicit Theories of Relationships (ITR) can be understood to operate along two dimensions: destiny and growth beliefs. Destiny beliefs about romantic relationships predispose someone to believe in love at first sight, to place value and importance on initial feelings of satisfaction, and to expect a romantic relationship to be fixed and remain the same over time (Knee, 1998; Knee, Patrick, & Lonsbary, 2003). Growth beliefs predispose someone to believe that a relationship grows over time, that cultivation of a relationship is healthy, and to expect a romantic relationship to be malleable (Knee, 1998; Knee et al., 2003). Research has demonstrated that these two dimensions lead to differing behaviors within a relationship, such as how couples resolve conflict and couple expectations for satisfaction (Knee et al., 2003).

Numerous studies have demonstrated the link between attachment and marital satisfaction (Chung, 2014; Givertz, Woszidlo, Segrin & Knutson, 2013; Parker, Tambling, & Campbell, 2013). The interpersonal processes that occur due to attachment insecurity directly influence a dyadic relationship. However, there has been very little research on how individual differences in attachment influence differences in motivation and behaviors within romantic relationships. Furthermore, because ITR is a relatively new field, little research has been done to

determine what factors help develop these cognitive schemas that influence motivations and behaviors within a relationship. This study aims to explore the influential effects of implicit theories of relationships on attachment's impact on marital satisfaction.

CHAPTER II

Literature Review

Marital Satisfaction

Marital satisfaction has been the focus of many studies involving romantic relationships. In the United States marriage rates have been around 50% for the last 10 years, demonstrating that marriage relationships are a very common occurrence for adults (Census Bureau, 2009). While census data cannot capture every type of romantic relationship, data indicates that cohabitation before marriage has increased as well, adding to the number of people who are in committed romantic relationships (Kennedy & Bumpass, 2008). As the majority of the population are currently involved in or will become involved in a romantic relationship, it is important to recognize how these relationships affect individuals and systems at large.

Definition and investigation of marital satisfaction. Researchers interchangeably use various terms throughout the literature to describe the same variable. Marital satisfaction, marital quality, marital adjustment, and marital happiness are just a few of the alternate names researchers use to understand the same variable (Graham, Diebels, & Barnow, 2011).

Researchers have argued that if these different terms are not capturing the same variable, they are at the very least part of a higher order factor (Cohen, 1985; Fincham & Bradbury, 1987). For the definition of marital satisfaction, it is more helpful to look at the measures that aim to capture this variable in research. The constructs or subscales that are often identified in measures for marital satisfaction include general global happiness, dyadic consensus, perceptions of the relationship, perception of the significant other, satisfaction with the significant other, satisfaction with the relationship, and affectional expression (Graham et al., 2011). Most of these constructs are self-report perceptions of the state of the relationship as well as the significant

other, but a few of the constructs break down specific contributing factors towards marital satisfaction such as the behaviors and emotions involved within the relationship. In this study, the construct of marital satisfaction will be used as the higher order variable to capture both satisfaction and contributing factors involved in the global evaluation of a relationship such as dyadic adjustment, dyadic consensus, and affectional expression.

Marital satisfaction is defined as a mental state that reflects the perceived benefits and consequences of being in a relationship with a particular person (Bradbury, Fincham, & Beach, 2000). Marital satisfaction is often used as a means to assess the overall quality of a romantic relationship. Psychological research has aimed to understand the contributing factors of marital satisfaction because it is recognized as one of the strongest predictors of overall life satisfaction (Carr, Freedman, Cornman, & Schwartz, 2014; Carr & Springer, 2010). Marital satisfaction has many different contributing factors including biological, cognitive, and social factors. Studies have consistently linked negative, global attributions for both cause and responsibility with greater relationship distress and lower relationship satisfaction (Baucom, Sayers, & Duhe, 1989; Bradbury, Beach, Fincham, & Nelson, 1996; Fincham, 1985; Osterhout, Frame, & Johnson, 2011), even when controlling for additional variables such as depression (Fincham & Bradbury, 1993; Fincham, Beach, & Bradbury, 1989), intimate partner violence (Fincham, Bradbury, Arias, Byrne, & Karney, 1997), self-esteem (Fincham & Bradbury, 1993), and negative affectivity (Karney, Bradbury, Fincham, & Sullivan, 1994). These findings indicate that attributional processes can have a significant impact on how individuals experience their relationship, thereby increasing or diminishing dyadic adjustment. Marital satisfaction is also correlated with participation in couple leisurely activities, personality characteristics, social similarities, and interaction style (Bradbury et al., 2000; Carr et al., 2014; Carr & Springer, 2010). Marital

satisfaction is understood in the literature as constantly changing within a relationship due to life stressors and events. Gilford and Bengtson (1979) suggested that couples experience four different stages of marital satisfaction: (a) honeymoon stage; (b) employment and/or child-rearing stage; (c) empty nester stage; and (d) retirement stage. With each of these stages, the couple must adapt to various life stressors and macrocontexts that occur throughout the relationship (Bradbury et al., 2000). By measuring marital satisfaction throughout the lifespan of a relationship, researchers can better identify factors that help nurture or hinder the relationship.

Nature and determinants of marital satisfaction. Bradbury, Fincham, and Beach (2000) highlighted two main categories that influence the variability of marital satisfaction. The first category is the sociocultural ecologies and contexts within which marriages operate and the second category is the interpersonal processes that operate within marriages.

Contexts within which marriages operate. The first category argues that multiple external factors are constantly influencing the experience of a relationship and how it can be perceived. Bradbury and colleagues (2000) further broke down the category through multiple subcategories: (a) children, (b) spouses' backgrounds and characteristics, (c) life stressors and transitions, and (d) macro-contexts. Each of these categories speaks to external influences on the interpersonal relationship and therefore calls for certain reactions or responses by the dyad. Due to the systemic nature of these external influences, it is apparent that the subcategories can influence each other.

For example, research has demonstrated that having children causes a transition for couples. This transition often calls into question many beliefs and values, bringing to the surface specific issues that may not have arisen prior to having children (Cowan & Cowan, 1992; Johnson & Huston, 1998; Levy-Shiff, Goldshmidt, & Har-Even, 1991). Uncooperative co-

parenting behaviors have been linked to deterioration in the marital relationship (Bradbury et al., 2000). Parenting behaviors are greatly influenced by spouses' backgrounds and characteristics. There is evidence that the relationship between an individual's parents can inform his or her own understanding within a relationship, both as a spouse and as a parent (McLanahan & Bumpass, 1988). Consequently, a family history of affective disorders can influence how smoothly transitions occur within a relationship such as becoming parents, moving to a new house, or dealing with a family conflict (Marks, Wieck, Checkly, & Kumar, 1996).

Another significant factor that is linked to spouses' backgrounds and characteristics is an individual's attachment security (Klohnen & Bera, 1998). Attachment influences an individual's working model of relationships and how those influences shape emotion regulation (Kobak & Hazan, 1991). Bradbury et al. (2000) have demonstrated how attachment can be understood as "an over-arching framework [that] can integrate individual-level variables and interpersonal processes to clarify determinants of marital satisfaction" (p. 971).

Interpersonal processes in marriage. The second category that Bradbury and colleagues (2000) outlined focuses more on the day-to-day functioning and behaviors within the system of the relationship, especially during marital conflict and marital problem-solving processes. Specifically, the category is broken down into the following subcategories: (a) marital cognition, (b) affect, (c) physiology, (d) patterns, (e) social support, and (f) violence. With each of these subcategories, the focus is on relationship processes and behaviors within the dyad. For example, marital cognitions often impact behaviors within the relationship because thoughts help motivate behaviors (Levenson & Gottman, 1985). Mood and affect also help motivate our behaviors and therefore are strong predictors of behaviors within a marital relationship (Thomas, Fletcher, & Lange, 1997). However, more recent research has tended to focus less on the outright behavior of

marital conflict and instead focus on interpersonal context. For example, Johnson et al. (2005) demonstrated that not only negative behaviors, but also positive affect were essential for understanding changes in marital satisfaction over time. Additionally, providing social support to one's spouse buffers the effects of changes in chronic stress on marital satisfaction (Brock & Lawrence, 2008). It is important to note that interpersonal processes affect marital satisfaction in a longitudinal way, demonstrating that patterns and persistent beliefs within the system affect marital satisfaction more than just the momentary or situational behavior that occurs in marital conflict or problem-solving behavior.

By looking at the research surrounding marital satisfaction in the last twenty years, it can be understood that both interpersonal processes and individual factors influence the dyadic relationship. Attachment is one significant area of research that predicts marital satisfaction through both interpersonal processes and individual factors.

Attachment

Attachment theory. The theory of attachment offers some understanding for the mechanisms contributing to marital satisfaction. Attachment theory began with the pioneering work of Bowlby, followed by Ainsworth (Ainsworth, 1989). Bowlby argued that attachment was driven by human beings' inherent need for relationships. Specifically, Bowlby recognized that humans sought out proximity to affectionate, trusted, and supportive attachment figures as part of their survival and therefore viewed the loss of such proximity and contact as distressing and dysfunctional (Bowlby, 1988). Ainsworth engaged in clinical observations of Bowlby's theoretical understanding of attachment. Through her creation of the Strange Situation, Ainsworth was able to observe the different patterns of attachment behavior exhibited by infants. She found three main patterns of behavior categorized as secure, anxious/ambivalent, and

anxious/avoidant (Ainsworth, Blehar, Waters, & Wall, 1978). Caregivers of securely attached infants were seen as available and consistent sources of comfort for the infant. Caregivers of anxious/ambivalent infants were seen as inconsistent in their responses to their infants' distress and as a result, hyperactivation of attachment behaviors was observed. Caregivers of anxious/avoidant infants were seen as non-responsive to the infant's distress on a recurrent basis, fomenting a deactivation of attachment behaviors. In this way, Ainsworth was able to demonstrate that infant behavior is affected by a caregiver's responses to signals of distress communication (Ainsworth, 1993). Both Bowlby and Ainsworth argued that attachment continued throughout the lifespan, an assertion that has since been supported by empirical research.

Attachment in adulthood. Main's research continued the development of attachment theory by demonstrating the existence of similar attachment patterns in adults (Main, Kaplan, & Cassidy, 1985). Main believed that individual differences in attachment behavior could be further described by individual internal working models of relationships derived from early attachment relationships. In this way, both secure and insecure attachment styles were not only present in infancy, but would also continue from childhood into adulthood (Main et al., 1985). Main explored the stability of attachment security and insecurity later in life both by longitudinal research (Main, Hesse, & Kaplan, 2005) and by interviewing adults about childhood relationships with parents and patterns of attachment over the individual's history. Main proposed four categories of attachment for adults as (a) secure, (b) dismissive, (c) preoccupied, and (d) disorganized (Main et al., 2005)

Continuing work with internal working models of relationships, Hazan and Shaver (1987) conceptualized romantic love as an attachment process. Because of the internal working models

created through attachment behavior, individuals understand adult love relationships differently based on their attachment style during infancy (Hazan & Shaver, 1987). Hazan and Shaver (1987) found that adults could classify themselves into the three attachment categories already identified by Ainsworth: secure, avoidant, and anxious/ambivalent. The adults also demonstrated differences in how they approached and thought of romantic love which correlated to differing attachment styles. Specifically, those who were classified as securely attached based on childhood experiences with parents demonstrated more open ideas about romantic love, those who were classified as avoidantly attached demonstrated disbelief in the possibility of romantic love, and those who were classified as anxiously/ambivalently attached demonstrated that falling in love was easy, but that true romantic love might be impossible (Hazan & Shaver, 1987).

Bartholomew and Horowitz (1991) tested a four-category model that took into consideration two dimensions: model of self, which they labeled dependence, and model of others, which they labeled avoidance of intimacy. Both dimensions allow for levels ranging from low to high. Based on these two dimensions, the four-category model Bartholomew and Horowitz (1991) proposed classified the following continuous areas of attachment: (a) secure, (b) preoccupied, (c) dismissing, and (d) fearful. Through a combination of interview ratings, self-report ratings, and friend-report ratings, Bartholomew and Horowitz (1991) demonstrated the attachment categories were significantly associated with attributions of self and others. Specifically, secure individuals have positive view of self and others, preoccupied individuals have positive view of others while holding negative view of self, dismissing individuals have positive view of self while holding negative view of others, and fearful individuals have negative view of both self and others. These findings demonstrate a fine-tuned approach to how internal working models may be associated with attachment dimensions.

Fraley and Shaver (2000) argued that a continuous rather than categorical approach toward attachment would better capture the dimensions of anxiety and avoidance. The anxiety dimension is in reference to fears of rejection and abandonment. The avoidance dimension is in reference to discomfort with closeness or intimacy with others. Fraley and Shaver (2000) argued that since most measurements of adult attachment are self-report measures, the two dimensions that reflect the actual reports of attachment behavior lie in the actual assessment of behavior. For this reason, a more accurate representation of the dimensions would be hyperactivation and deactivation of attachment behaviors. They found that individuals high on the anxiety dimension tend to increase vulnerability, expressed need, or anger at unresponsive partners. Individuals high on the avoidance dimension, display a decreasing pattern in these behaviors. Through taxometrics, research has supported the strength of the orthogonal, continuous variable model of attachment over the categorical model, both for global attachment orientations and relationship-specific attachment orientations (Fraley, Hudson, Heffernan, & Segal, 2015; Fraley & Waller, 1998).

Attachment and marital satisfaction. Attachment's continued influence in adult relationships and with romantic partners helps explain variances in marital satisfaction for couples. Research has shown that individuals who demonstrate attachment security as opposed to high levels of attachment-anxiety or avoidance will react and behave differently in long-term romantic relationships (Dillow, Goodboy, & Bolkan, 2014). Secure attachment styles predict availability, reliability, and a corresponding increase in marital satisfaction (Mikulincer, Florian, Cowan, & Cowan, 2002), while attachment-related insecurity leads to greater relationship dissatisfaction (Kobak, Ruckdeschel, & Hazan, 1994). During a relationship, attachment injuries or instances that demonstrate a partner's unavailability, infidelity, abuse, or rejection can create

times of either deactivation or hyperactivation of attachment behaviors. These attachment injuries are incorporated into the individual's working model of the relationship and continue the negative feedback between the couple (Vorauer, Cameron, Holmes, & Pearce, 2003). Overall, individuals with insecure attachment consistently demonstrate lower rates of relationship satisfaction (Chung, 2014; Karantzas et al., 2014; Towler & Stuhlmacher, 2013). Attachment has been supported in the literature as a unique variable affecting relationship satisfaction after controlling for possible confounding variables such as "Big Five" traits, depression, self-esteem, or sex-role orientation (Carnelley, Pietromonaco, & Jaffe, 1994; Jones & Cunningham, 1996; Nofhle & Shaver, 2006; Shaver & Brennan, 1992; Whisman & Allan, 1996).

The distinction between the two dimensions of attachment in predicting marital satisfaction ratings has not significantly demonstrated major differences in marital satisfaction at a general level, but has been shown to demonstrate differing patterns of behaviors in the relationship. Individuals who have high avoidance attachment tend to demonstrate more skepticism at the beginning of the relationship as well as disengagement from the relationship when distress occurs (Brock & Lawrence, 2014; Karantzas et al., 2014). This deactivation lends itself to poor communication skills and conflict resolution skills (Morey, Gentzler, Creasy, Oberhauser, & Westerman, 2013; Saavedra, Chapman, & Rogge, 2010). Individuals who have high anxiety attachment tend to demonstrate more commitment and intimacy early in the relationship and become reactive if commitment and intimacy are not reciprocated by the partner (Madey & Rodgers, 2009; Chopik, Moors, & Edelstein, 2014). In this way, hyperactivation leads to blaming, negative beliefs about the relationship, and overall negative affectivity (Overall, Girme, Lemay, & Hammond, 2014).

The behaviors that are linked with secure or insecure attachment are often seen as mediators between the attachment-satisfaction relationship and not necessarily as always specific to either dimension of attachment. These behaviors tend to negatively reinforce attachment insecurities, resulting in a negative feedback loop that occurs between attachment-insecurities and ineffective coping behaviors undertaken in relationships (Karantzas et al., 2014; Rholes, Kohn, & Simpson, 2014). In this way, attachment is associated with behaviors that can be further detrimental for marital satisfaction as well as buffering factors that could help repair marital satisfaction, even with attachment insecurities. Hadden, Smith, and Webster (2014) found that relationship duration moderated the association between attachment insecurities and marital satisfaction. In addition, characteristics such as forgiveness, commitment and intimacy, and relationship-enhancing behaviors appear to buffer the relationship between insecure attachment and relationship satisfaction ratings (Chung, 2014; Madey & Rodgers, 2009; Pepping & Halford, 2012).

In conclusion, attachment theory is a building block that individuals use to understand their world and create internal working models. Attachment behaviors manifest themselves when there is an attachment injury. A fundamental assumption of attachment theory is that attachment figures serve the function of helping individuals regulate feelings of distress in the face of a threat (Bowlby, 1980; Sroufe & Waters, 1977); research has yet to look at how attachment translates to an internal working model about the dyad rather than the individual. Implicit theories of relationships provides a bridge between the individual and the dyad.

Implicit Theories in Romantic Relationships

History of implicit theory. Implicit theories branched from the work of Heider's (1944) field theory of social perception and Kelly's (1955) theory of personality and personal

constructs. In Heider's theory of social perception, biases that lead to errors in perception may be perceived in social situations as they are with objects. An individual's social perception is highly influenced by the need to understand other people in simple and unambivalent ways. Therefore, individuals perceive others with the intention of establishing balance and simplicity in their own world (Heider, 1944). In conjunction with this theory, Kelly's (1955) theory states that people anticipate events by the meanings or interpretations (personal constructs) they have of those events. Combining Heider and Kelly's theories, implicit theories are then based on both perceptions individuals have of the world and the expectations individuals have due to those perceptions. Implicit theories are therefore seen as a socially learned phenomenon that influences an individual's cognitions and future behaviors.

Implicit theories guide individuals on how to respond and behave in situations based on expectations and automatic assumptions about the self and the social world. Specifically, Ross (1989) defined implicit theories as "schematic knowledge structures that involve specific beliefs about the stability of an attribute and the conditions that are likely to promote change" (as quoted in Knee & Canevello, 2006, p. 161). Generally, there are two main implicit theories: fixed or entity theory and malleable or incremental theory. Entity theory suggests that personal attributes are stable, immutable, and set over time, while incremental theory suggests that personal attributes are capable of change, adaptation, and growth. Research has demonstrated that an individual's implicit theories of personal attributes, such as intelligence or personality traits, influence his or her decisions, stress, belief of failure, and social judgments in response to simple behaviors (Dweck, 1996; Erdley & Dweck, 1993). Researchers continued examining other social situations that might warrant a fixed or malleable theory of understanding. Interpersonal

relationships, especially romantic relationships, became a main focus of interest for researchers in the field of social psychology and implicit theory.

Implicit theories of relationships. Knee (1998) first used implicit theory to examine different expectations of romantic relationships, coining the term implicit theories of relationships (ITR). He described ITR as a belief about the nature of relationships, specifically about how to maintain a good relationship. Knee observed that implicit theory research was able to predict an individual's behavior in a particular domain based on his or her beliefs about that domain (Knee, et al., 2003). Similar to the original understanding of fixed and malleable theories, Knee originally focused on two types of theories for romantic relationships: destiny and growth models. In the destiny model, individuals believe that potential relationship partners are either meant for each other or not, demonstrating an entity theory around relationships. In the growth model, individuals believe that successful relationships are cultivated and developed, demonstrating an incremental theory around relationships. In his first study exploring these constructs, Knee (1998) not only confirmed the constructs to be significantly different from each other, but also found multiple implications for relationships using the two constructs. Specifically, the results demonstrated that destiny belief systems predicted shorter relationships, endorsement of disengagement strategies, and importance of first impressions while growth belief systems predicted longer and more committed relationships and endorsement of relationship-maintenance strategies (Knee, 1998). Knee's research led to further conceptualization of destiny and growth models, expanding into the belief that relationships should be diagnosed (evaluation) and the belief that problems in relationships can be overcome (cultivation; Knee et al., 2003). Furthermore, individuals would not necessarily be categorized as either destiny or growth, but rather should be rated along both destiny and growth dimensions

resulting in four variables: (a) optimization, (b) cultivation, (c) evaluation, and (d) helplessness. Two of the possibilities, cultivation and evaluation, demonstrated the extremes of fixed and malleable theories. These modes of thought are understood to be orthogonal rather than dichotomous variables for the individual. Subsequent research for ITR was completed in order to further substantiate these variables (Knee et al., 2003; Knee, Patrick, Vietor, & Neighbors, 2004).

Implicit theories influence on marital satisfaction. ITR research has found mixed relationship outcomes with regard to growth and destiny theories. When examining simple marital satisfaction scales, researchers have found that destiny theorists report higher levels of happiness and comfort in relationships (Knee, 1988; Knee & Canevello, 2006). Specifically, having a destiny theory coupled with initial relationship satisfaction would translate to general satisfaction with the relationship. If there is low initial satisfaction, individuals with a destiny belief system are more likely to end that relationship and not pine over the loss, understanding it as “not meant to be” (Knee, 1998). Further, individuals with a destiny belief system are more likely to have a larger discrepancy between the idealization of their partner and the actual characteristics of the partner, giving more credit to the partner than is actually due. This increased perception of ideal characteristics predicted higher relationship satisfaction (Knee, Nanayakkara, Vietor, Neighbors, & Patrick, 2001). However, having a growth belief system has been demonstrated to predict healthier, more practical, and more lasting relationships (Knee & Canevello, 2006).

Kammrath and Dweck (2006) found that relationships characterized by growth theory were more likely to voice their displeasure with partners openly and constructively during a fight or disagreement when compared to relationships characterized by destiny theory. Further,

Kammrath and Peetz (2012) found that not only did implicit theories predict the different ways that people deal with conflict, but also the genesis of conflict. In their study, results demonstrated that growth theorists expected positive change by their partner to occur. When change did not occur or did not occur fast enough, partners became more distrustful of one another. The researchers attributed this distrust to the assumption that, since attributes and behaviors are malleable, growth theorists are left to believe that positive change does not occur because their partner was not putting in enough effort, rather than because of the difficulty of the change.

Burnette and Franiuk (2010) focused on developing relationships and delineated participants as having either high destiny ratings or high growth ratings. They found that individuals with high destiny theory scores were more likely to rely on information about partner as “ideal” when deciding whether or not to forgive, while individuals with high growth theory scores made decisions on forgiveness without any significant difference on whether or not they felt their partner was a good fit. Due to the overall influences of implicit theories of relationships on conflict coping, the incremental and growth models predict a longer relationship that encompasses conflict and resolution (Burnette & Franiuk, 2010).

The effect of attachment on implicit theories of relationships. Research demonstrates that romantic relationships are often established to meet emotional and security needs as well as to become a collaborative dyad that often takes on responsibilities in life in an interdependent way (Finkel & Eastwick, 2015). For this reason, attachment theory can shed light on the formation of implicit theories of relationships because of the understanding that (a) attachment behaviors are an individual's natural way to first relate to others, (b) romantic love is an attachment process and (c) attachment influences internal working models (Ainsworth, 1989; Bowlby, 1980; Hazan & Shaver, 1987). The goal of attachment behavior is to fulfill the need to

be safe and secure in a time of distress through the comfort, availability, and reliability of an attachment figure. The goal of implicit theories of relationships is to evaluate and/or cultivate the relationship in order to achieve relationship satisfaction. Research has not yet looked at these two constructs together, especially in light of each theory's idiosyncratic impact on relationship satisfaction and potential aspects of intersecting influence.

The Present Study and Hypotheses

There has not been much informative research on the association between attachment theory and implicit theories of relationships to this point. This is most likely due to the different areas of psychology from which the constructs evolved— attachment from psychoanalytic theory and implicit theories of relationships from social cognition theory. The investigation of this association can lead to a better understanding of how the individual goal of attachment predicts the dyadic goal of marital satisfaction through the use of motivating perceptions around relationships.

The first and second hypotheses of this study sought to replicate previous research findings where both attachment dimensions (anxiety and avoidance) will predict marital satisfaction (Chung, 2014; Karantzas et al., 2014; Towler & Stuhlmacher, 2013). The third hypothesis was that implicit theories of relationships would indirectly affect the relationship between attachment insecurity and marital satisfaction. That is, it was expected that attachment-anxiety would be positively associated with destiny belief, and destiny belief would be negatively associated with marital satisfaction. In addition, it was expected that attachment-anxiety would be negatively associated with growth belief, and growth belief would be positively associated with marital satisfaction. When examining attachment-avoidance, it was expected that attachment-avoidance would be negatively associated with both destiny and growth belief, and destiny belief would be

negatively associated with marital satisfaction while growth belief would be positively associated with marital satisfaction. In addition, it was expected that attachment-anxiety would be negatively associated with growth belief, and growth belief would be positively associated with marital satisfaction. The hypothesized relationships are summarized below and demonstrated with Figure 1.

- Hypothesis 1: Attachment anxiety would negatively predict marital satisfaction.
- Hypothesis 2: Attachment avoidance would negatively predict marital satisfaction.
- Hypothesis 3: Attachment would have an indirect effect on marital satisfaction through implicit theories of relationships such that:
 - Hypothesis 3a: Attachment-anxiety would predict increased destiny belief, which in turn would lead to reduced marital satisfaction.
 - Hypothesis 3b: Attachment-anxiety would predict decreased growth belief, which in turn would lead to heightened marital satisfaction.
 - Hypothesis 3c: Attachment-avoidance would predict decreased destiny belief, which in turn would lead to reduced marital satisfaction.
 - Hypothesis 3d: Attachment-avoidance would predict decreased growth belief, which in turn would lead to heightened marital satisfaction.

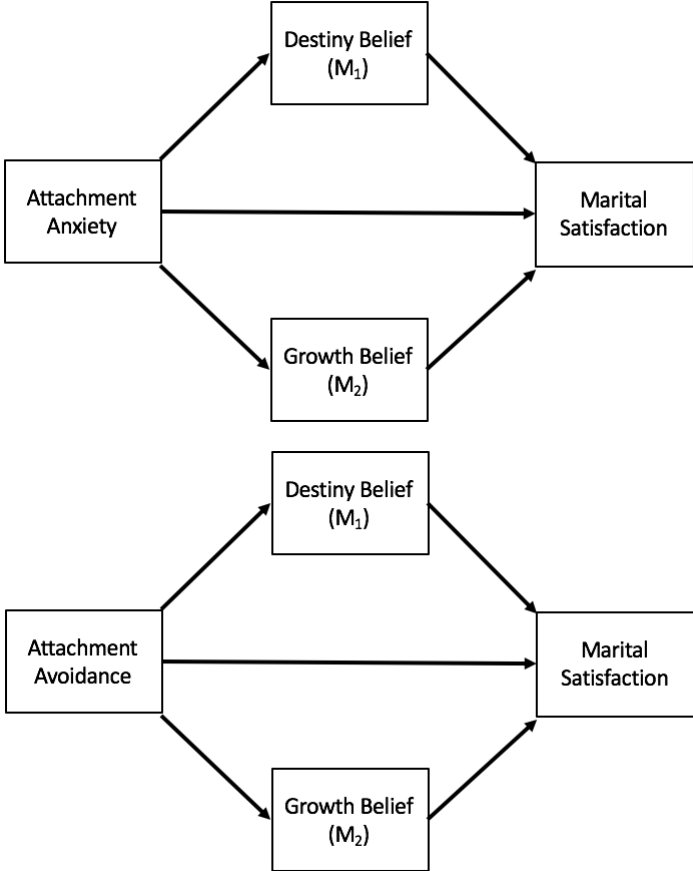


Figure 1. Conceptual, diagrammatic model of hypothesized relationships.

CHAPTER III

Method

Participants

Determining sample size. Participants were recruited from both faculty and staff of a small private university as well as through an online recruitment process on various community sites. Based on the anticipated magnitudes of this study's model paths, to obtain a power of .80 with a moderate effect size of $f^2 = .15$, the required N was 76 (Faul, Erdfelder, Lang, & Bauchner, 2007). Prior studies exploring the association between attachment and marital satisfaction either neglect the use of effect size to report results or report a small to moderate effect size (Banse, 2004; Butzer & Campbell, 2008; Meyers & Landsberger, 2002). The few studies that have been completed associating implicit theories of relationships with marital satisfaction have demonstrated small effect sizes (Weigel, Davis, & Woodward, 2015). Equivalent studies exploring these variables reflect a range in sample size from 73 to 333 individuals (Banse, 2004; Butzer & Campbell, 2008; Meyers & Landsberger, 2002; Weigel et al., 2015).

Recruitment, eligibility, and sample characteristics. Participants were recruited by means of e-mail and postings on online community boards. Through email, the entire faculty and staff of a small, private university were invited to participate in the study. Through online community boards, individuals were informed of the study and the option to participate. For both e-mail and the online posting, participants were offered to enter a drawing for an Amazon gift card.

There were two eligibility requirements for participants in this study. First, the participant must be at least 18 years old. The second eligibility criterion was that the participant currently be

in a serious romantic relationship. This was defined as being in an exclusive relationship for at least one year. Allowing for both married and unmarried participants in the research offered more information across different models of romantic relationships. Being in the relationship for at least one year gave a higher chance for the significant other to be understood as an attachment figure in the participant's life.

The final study sample included 82 participants (87% female) with a mean age of 33.95 ($SD = 8.81$). The average length of current relationship was 10.70 years ($SD = 8.98$) with 68.3% of participants married, 22% dating, and 9.8% cohabitating. Further, 90.2% identified as heterosexual with 8.5% identifying as bisexual and 1.2% identifying as other. Within the 82 participants, 86.6% identified as Caucasian, 7.3% Hispanic/Hispanic American, 3.7% other, and 2.4% Asian/Asian American. Lastly, 32.9% of participants identified as Protestant Christian, 9.8% as Catholic, 4.9% as Jewish, 1.2% as LDS/Mormon, 14.6% Atheist, and 36.6% as no preference or other.

Consent and confidentiality. Participants first agreed to the informed consent before being directed to the measures for the study. They then were directed to four measures: the demographic questionnaire, the DAS, ECR-R, and ITRs. Once beginning participation, confidentiality was protected by giving each participant a randomly generated ID number assigned by Qualtrics.com (a website designed for survey materials). The only identifying information that was associated with the participants was an e-mail address that was used to notify the results of the gift card drawing at the end of the data collection process. This contact information was kept separate from the results and was stored in a password-protected excel file on the investigator's personal computer. The local Institutional Review Board approved the study before initiation of recruitment or data collection.

Participant Interaction Procedure. After recruitment and determination of eligibility through use of the informed consent and the demographics questionnaire, participants were invited to continue the study by completing the measures for attachment, implicit theories of relationships, and marital satisfaction. They completed all three of these measures using the Qualtrics website from the convenience of their own computer devices. After completing the questionnaires, they were debriefed about the study and given contact information if they had any further questions. The participants were then notified at the end of data collection through e-mail regarding the results of the gift card drawing.

Measures

Participant demographic characteristics. The demographic questionnaire was used to identify variables necessary for scoring, eligibility criterion, and possible confounding variables. The demographic survey consists of 8 items. Specifically, three questions served to ascertain eligibility (i.e., age, relationship status, and length of current relationship). Four questions assessed general demographic information such as gender, sexual orientation, religious affiliation, and culture/ethnic background. Lastly, the questionnaire included an item asking for participants' email addresses to contact the participant about the results of the drawing for the gift card at the end of the data collection process. This question was voluntary and did not impact the individual's participation in the study.

Marital Satisfaction. The Dyadic Adjustment Scale (DAS; Spanier, 1976) was used to assess marital satisfaction. It is a 32-item measure assessing the quality of marriage and other similar dyads. The DAS is a self-report measure for an individual within a dyad. The 32-items are divided into four subscales: (a) Dyadic Consensus; (b) Dyadic Satisfaction; (c) Dyadic Cohesion; and (d) Affectional Expression. The four subscales were determined through a factor

analysis program in SPSS (Nie, Bent, & Hull, 1970). Through this program, the researchers used an oblique rotation and determined the factor loadings for the subscales. Any factors that did not load properly on a factor were eliminated. Eight items were eliminated from the original 40-item measure due to unsuitable factor loading. There are eight different 6-point Likert scales within the 32 items for how the participant is asked to answer each question. Some example questions from the measure are as follows: “How often do you discuss or have you considered divorce, separation, or terminating your relationship?”, “Do you confide in your mate?”, and “How often do you or your mate leave the house after a fight?”. The DAS creates composite scores detailed in the manual that for each of the four subscales.

The DAS was assessed using 218 married individuals and 94 divorced individuals to determine criterion-related validity. The assessment demonstrated statistically significant differences between the married ($M = 114.8$) and the divorced individuals ($M = 70.7$) at the $p = .001$ level. To assess for construct validity, the researcher correlated the DAS to the Locke-Wallace Marital Adjustment Scale, yielding a correlation of $r = .86$. Construct validity was further determined through factor analysis of the 32-item scale, determining the four subscales of the measure. A later study completed an exploratory factor analysis and confirmatory factor analysis of the DAS to determine the structural validity of the measure (Spanier & Thompson, 1982). The exploratory factor analysis examined six different models, ranging from the measure having one factor to six factors. Once the model reached four factors, the change in chi-square drops, leaving the four-factor model with $\chi^2(374) = 571, p = .001$, and a reliability of .95. The DAS was assessed for reliability using Cronbach’s alpha on all four of the subscales as well as the DAS as a whole. The total scale reliability was $\alpha = .96$ while the four subscales ranged from $\alpha = .73$ to $\alpha = .94$ (Spanier & Thompson, 1982).

In my current study, a series of estimates of reliability were conducted for each of the four subscales of the DAS as well as the total scale reliability. The coefficient alpha for the total scale was $\alpha = .92$ while the four subscales ranged from $\alpha = .73$ to $\alpha = .87$. These figures indicate acceptable levels of internal consistency.

Attachment avoidance and attachment anxiety. The Experiences of Close Relationships – Revised scale (ECR-R; Fraley, Waller, & Brennan, 2000b) measures both attachment avoidance and attachment anxiety for adults through a two-dimensional model. The ECR-R is a self-report measure that consists of 36-items. These items are divided into two 18-item subscales: Attachment Avoidance and Attachment Anxiety. The measure is a revision of the original Experiences in Close Relationships scales (ECR; Brennan, Clark, & Shaver, 1998) using item response theory (Fraley, Waller, & Brennan, 2000). Item response theory is designed to represent the “relation between an individual item response and an underlying latent variable” (Fraley et al., 2000, p. 351). By examining the pool of 323 items collected by Brennan et al. (1998), item response theory was used to perform a principal-axis factor analysis on 30 clusters of homogenous items. These items were gathered through the use of a cluster analysis. Fraley et al. (2000) decided to distinguish the separate markers for the two dimensions with the criterion of correlating higher than .40 with one factor and less than .25 with the other factor to distinguish independence of the items for each dimension. Through this process, the two 18-item subscales were created. Each item is rated on a 1 (*strongly disagree*) to 7 (*strongly agree*) Likert-type scale. An example item from each dimension of the measure is as follows: “I often worry about my relation” (Anxiety) and “I prefer not to be too close to romantic partners” (Avoidance). The scale will give two averaged scores, one for attachment anxiety and one for attachment avoidance, as recommended by Fraley et al. (2000). In this way, an individual will receive a

score ranging from 1 to 7 for each dimension, with higher scores demonstrating higher levels of either anxiety or avoidance.

The ECR-R was assessed further in three different studies conducted by Sibley, Fischer, and Liu (2005). The first study aimed to determine the ECR-R's temporal stability and factor structure. This was achieved by using an exploratory factor analysis and test-retest stability across a 3-week period assessing 300 people (67% female; mean age = 22) and comparing it with another common measure used for attachment, the Relationship Questionnaire (RQ; Bartholomew & Horowitz, 1991). These analyses determined that both ECR-R composite measures of anxiety and avoidance loaded solely on an individual factor (anxiety loadings = .92; avoidance loadings = .74) and that the two dimensions of the ECR-R were temporally stable (avoidance: $\beta = .90$, $R^2 = .84$; anxiety: $\beta = .92$, $R^2 = .85$). In the second study, Sibley and colleagues (2005) used confirmatory factor analysis (CFA) to test how well the data fit a hypothesized factor structure. The hypothesized two-factor model demonstrated goodness of fit for the data, $\chi^2(53, n = 478) = 142.26$, GFI = .95, NNFI = .98, CFI = .98, SRMR = .04, RMSEA = .06. Additionally, the single-factor model demonstrated significantly poorer fit than the two-factor model, $\chi^2_{diff}(1) = 3.480.86$, $p < .001$. Lastly, the third study assessed for convergent and discriminant validity of the ECR-R using diary methods of social interaction as an external criterion. HLM analyses demonstrated that ECR-R measures of anxiety predicted attachment-related anxiety experienced during social interactions ($\gamma = .46$) while ECR-R measures of avoidance predicted attachment-related avoidance experienced during social interactions at a similar magnitude ($\gamma = .51$). Overall, the ECR-R explained a large portion of the between-person variation in the quality of social interactions with a romantic partner, demonstrating convergent and discriminate validity for the ECR-R scales (Sibley et al., 2005).

In my current study, a series of estimates of reliability were conducted for each of the two scales of the ECR-R. The coefficient alphas for the ECR-R anxiety and avoidance scales was $\alpha = .89$ and $\alpha = .93$ respectively. These figures indicate acceptable levels of internal consistency.

Implicit Theories of Relationships. The Implicit Theories of Relationship scales (ITRs; Knee, Patrick, & Lonsbary, 2003) measure both destiny and growth beliefs pertaining to romantic relationships through a two-dimensional model. The measure is a self-report, 22-item questionnaire. The items are divided into two 11-item subscales: a) Destiny and b) Growth. The measure has developed from an original 8-item survey first used by Knee (1998) in his preliminary study of ITR. Through factor analysis, Knee determined that destiny and growth beliefs were independent from each other rather than on different ends of an individual spectrum. The two-factor model demonstrated goodness of fit, $\chi^2(209, n = 436) = 707.29, p < .001$, GFI = .86, RMSEA = .07. The measure utilizes a 7-point Likert scale ranging from 1 (*strongly disagree*) to 7 (*strongly agree*). Each item demonstrates an item-total correlation between .26 and .61. An example item from each dimension is as follows: “A successful relationship is mostly a matter of finding a compatible partner right from the start” (destiny) and “The ideal relationship develops gradually over time” (growth). The ITRs create two composite scores by averaging the responses for each subscale to get a score between 1 and 7. A higher score demonstrates a higher amount of either destiny or growth belief.

Due to the limited nature of research conducted around implicit theories of relationships, there is little demonstration of reliability and validity of this measure outside of Knee’s work. However, through his work the ITRs has demonstrated some reportable reliability and validity. When determining construct validity, Knee et al. (2003) found that destiny belief correlates positively with similar aspects of other measures such as the belief that partners cannot change

themselves (Partners Cannot Change; Eidelson & Epstein, 1982), pragmatic shopping-list approach to love (Pragma; Hendrick & Hendrick, 1986), and belief that there is only one potential partner, idealizing romance, and belief in love at first site (Romantic Beliefs subscale; Sprecher & Metts, 1989). Additionally, growth belief correlates positively with a gradual, friendship-based approach to love (Storge; Hendrick & Hendrick, 1986) and belief that love will find a way (Romance Beliefs subscale; Sprecher & Metts, 1989). Internal reliabilities for destiny and growth scales demonstrated adequate Cronbach's alpha levels, .82 and .74 respectively. Initial test-retest reliability was .52 and .40 for destiny and growth, respectively.

In my current study, a series of estimates of reliability were conducted for each of the two scales of the ITRs. The coefficient alpha for the destiny scale was $\alpha = .89$ and growth scale was $\alpha = .82$. These figures indicate acceptable levels of internal consistency.

CHAPTER IV

Results

Data Preparation

Before each hypothesis was tested, the data was prepared for analysis by (a) identifying and managing missing variables, and (b) evaluating continuous variables as a function of normality. Although normality is not always required for analyses, screening continuous variables for this assumption can be informative for understanding results (Tabachnick & Fidell, 2007). In the analyses, I used bias-corrected bootstrapping to measure direct and indirect effects and this procedure is robust to violations of normality (Hayes, 2013).

Data were analyzed and managed for missingness with the multiple imputation tools in SPSS version 25. A total of 119 participants completed part or all of the study materials. Eighty-four percent of the variables within the demographics survey, ECR-R, ITR, and DAS and 74.44% of the cases had some missing data. Remarkably, 94.28% of the values in the entire model had complete data revealing a haphazard pattern. Thirty-seven cases were removed from the dataset before analysis due to at least 24% missingness, allowing for a final sample size of 82. Of these 37 cases, 35 did not complete the final measure due to closing out of the survey early. The remaining two cases did not agree to the informed consent and were then redirected away from the rest of the survey. Multiple imputations yielded five new data sets to account for any other missing values. The data set that most aligned with the original data set based on descriptive statistics was used for correlation analysis (See Table 1 for descriptive statistics and bivariate correlations).

Table 1

Bivariate Correlations and Descriptive Statistics among Study Variables

Variable	<i>M</i>	<i>SD</i>	Range	1.	2.	3.	4.	5.
1. Attachment - Anxiety	2.41	.89	1 – 5.06	---	.63*	.01	.05	-.49*
2. Attachment - Avoidance	2.39	.98	1 – 4.83		---	-.10	.01	-.71*
3. Destiny Belief	3.40	.90	1.64 – 6.73			---	-.38*	.12
4. Growth Belief	5.22	.73	2.55 – 6.58				---	.06
5. Marital Satisfaction	110.41	13.76	53.00 – 139.00					---

Note. Final *N* = 82. * denotes significance at the .01 level (2-tailed).

The Kolmogorov-Smirnov statistic (K-S test; Field, 2005) was used to test each measure for univariate normality. As shown in Table 2, the distribution of scores for the all of the variables were significantly different than normal. Values of skewness (S) and kurtosis (K) provided further information about the shape of the variables distribution (see Table 1). Positive skewness values indicate a pile-up of scores on the left of the distribution; negative values indicate the pile-up is on the right. Regarding kurtosis values, positive values indicate higher degrees of peakedness; negative values indicate flatness. The results of these scores suggested that the Attachment Anxiety, Attachment Avoidance, and Destiny Belief have positive skewness (i.e., scores were piled up on the left) while Growth Belief and Marital Satisfaction have negative skewness (i.e., scores were piled up on the right). All of the variables demonstrated positive kurtosis (i.e., scores indicated higher degrees of peakedness).

Table 2

Assessing Univariate Normality of Continuous Variables

Variable	K-S Test			Kurtosis		Skewness	
	<i>D</i>	<i>df</i>	<i>p</i>	kurtosis	z kurt	skewness	z skew
Attachment Anxiety	.12	82	.009	.004	.007	.688	2.59**
Attachment Avoidance	.14	82	.000	-.040	.076	.776	2.92**
Destiny Belief	.07	82	.000	1.61	3.06**	.566	2.13*
Growth Belief	.08	82	.000	1.11	2.11*	-.605	-2.27*
Marital Satisfaction	.10	82	.030	4.24	8.06***	-1.40	-5.26***

Note. Note. *D* is the K-S Test Statistic. To facilitate interpretation, *z* values for kurtosis and skewness are calculated by dividing by their respective standard error. * denotes $p < .05$, ** $p < .01$, *** $p < .001$.

Data Analyses

Two models of parallel multiple mediation were analyzed examining the degree to which destiny belief and growth belief mediated the relation of attachment anxiety and attachment avoidance on marital satisfaction. Hayes (2013) recommended this strategy over simple mediation models because it allows for all mediators to be examined, simultaneously. The resultant direct and indirect values for each path account for other mediation paths. Using the PROCESS macro, coefficients for specific indirect, total indirect, direct, and total were computed. Path coefficients refer to regression weights, or slopes, of the expected changes in the dependent variable given a unit change in the independent variables.

First, the total effects of both attachment-anxiety and attachment-avoidance were significant for marital satisfaction ($b = -7.65, p < .001$; $b = -10.05, p < .001$, respectively). Specifically, both attachment-anxiety and attachment-avoidance negatively predicted marital satisfaction, providing support for my first two hypotheses. Results of a post-hoc GPower analysis (Faul, Erdfelder, Lang, & Buchner, 2007) indicated that when alpha is set to .05 and with a sample size of 82, this relationship achieved a power of 0.83. Second, results indicated nonsignificant indirect effects of either destiny or growth belief on the relationship between attachment and marital satisfaction. Additionally, there was nonsignificance on either pathway from attachment to implicit theories of relationships or implicit theories of relationships to marital satisfaction. These findings failed to provide support for Hypothesis 3 in its entirety. Results of the mediation analyses are provided in Table 3, Table 4, Figure 2, and Figure 3.

Table 3

Direct, Indirect, and Total Effects of Attachment Anxiety on Marital Satisfaction through Destiny Belief (M₁) and Growth Belief (M₂)

Effect	<i>b</i>	SE	<i>p</i>	95% CI	
				Lower	Upper
ANX → DB → M.SAT	.013 X 2.822 =	.036	.322	-.660	.699
ANX → GB → M.SAT	.039 X 2.905 =	.114	.301	-.621	.673
Total indirect effect		.150	.334	-.628	.763
Total effect of X on Y (c)		-7.65	1.51	.000	-10.66 -4.65
Direct effect of X on Y (c')		-7.80	1.50	.000	-10.78 -4.82

Note. ANX = Attachment Anxiety; DB = Destiny Belief; M.SAT = Marital Satisfaction; GB = Growth Belief. The significance of the indirect effects was calculated with the bias-corrected confidence intervals (.95) bootstrap analysis.

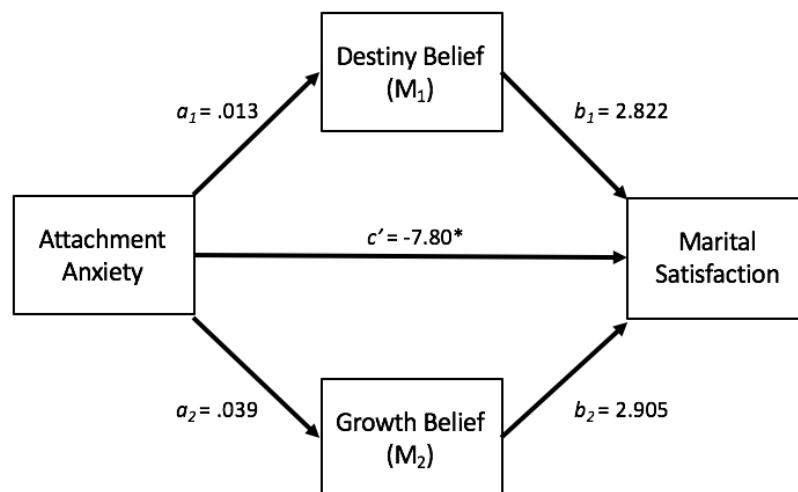


Figure 2. Diagrammatic model of destiny belief (M₁) and growth belief's (M₂) mediation of the relationship between attachment anxiety and marital satisfaction with the unstandardized *b* weights on the paths.

Table 4

Direct, Indirect, and Total Effects of Attachment Avoidance on Marital Satisfaction through Destiny Belief (M₁) and Growth Belief (M₂)

Effect	<i>b</i>	SE	<i>p</i>	95% CI	
				Lower	Upper
AVO → DB → M.SAT	-.094 X 1.324 =	-.124	.274	-.755	.414
AVO → GB → M.SAT	.009 X 1.926 =	.018	.274	-.526	.404
Total indirect effect		-.106	.291	-.778	.434
Total effect of X on Y (c)		-10.05	1.11	.000	-12.25 -7.84
Direct effect of X on Y (c')		-9.94	1.11	.000	-12.16 -7.72

Note. AVO = Attachment Avoidance; DB = Destiny Belief; M.SAT = Marital Satisfaction; GB = Growth Belief. The significance of the indirect effects was calculated with the bias-corrected confidence intervals (.95) bootstrap analysis.

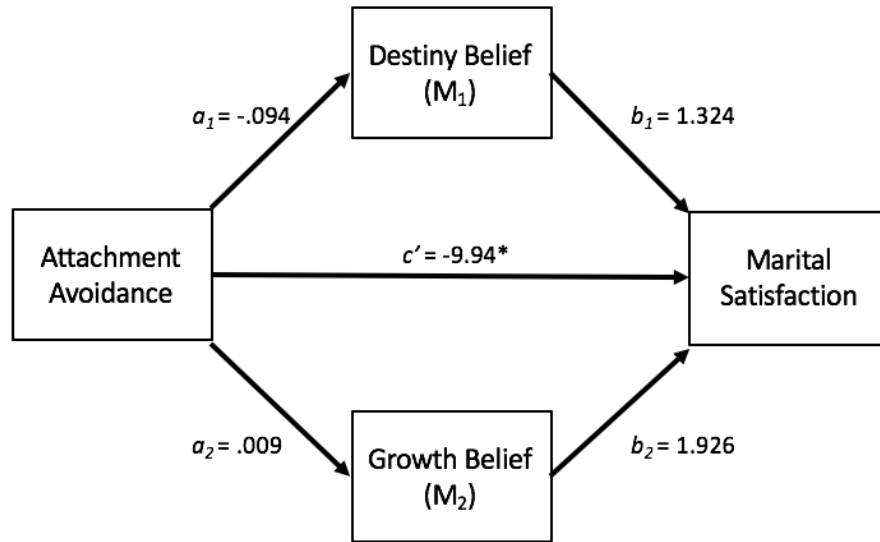


Figure 3. Diagrammatic model of destiny belief (M₁) and growth belief's (M₂) mediation of the relationship between attachment avoidance and marital satisfaction with the unstandardized b weights on the paths.

In post hoc analysis, I ran four moderation regressions examining the possible moderating effect of either destiny or growth belief on the relationship between attachment anxiety and avoidance and marital satisfaction. This was completed due to past research demonstrating implicit theories of relationships to be a very influential moderator in romantic relationship associations such as an individual “wanting more” from one’s partner and overall satisfaction with the relationship (Knee et al., 2001; Knee et al., 2004). Out of these four analyses, only one moderation demonstrated significant results. Destiny belief was found to significantly moderate the relationship between attachment avoidance and marital satisfaction ($\Delta F(1, 78) = 4.56, \Delta R^2 = .03, p < .05$). Individuals with high levels of destiny belief demonstrated the highest negative correlation between attachment avoidance and marital satisfaction, followed by individuals with average and low levels of destiny belief (see Figure 4).

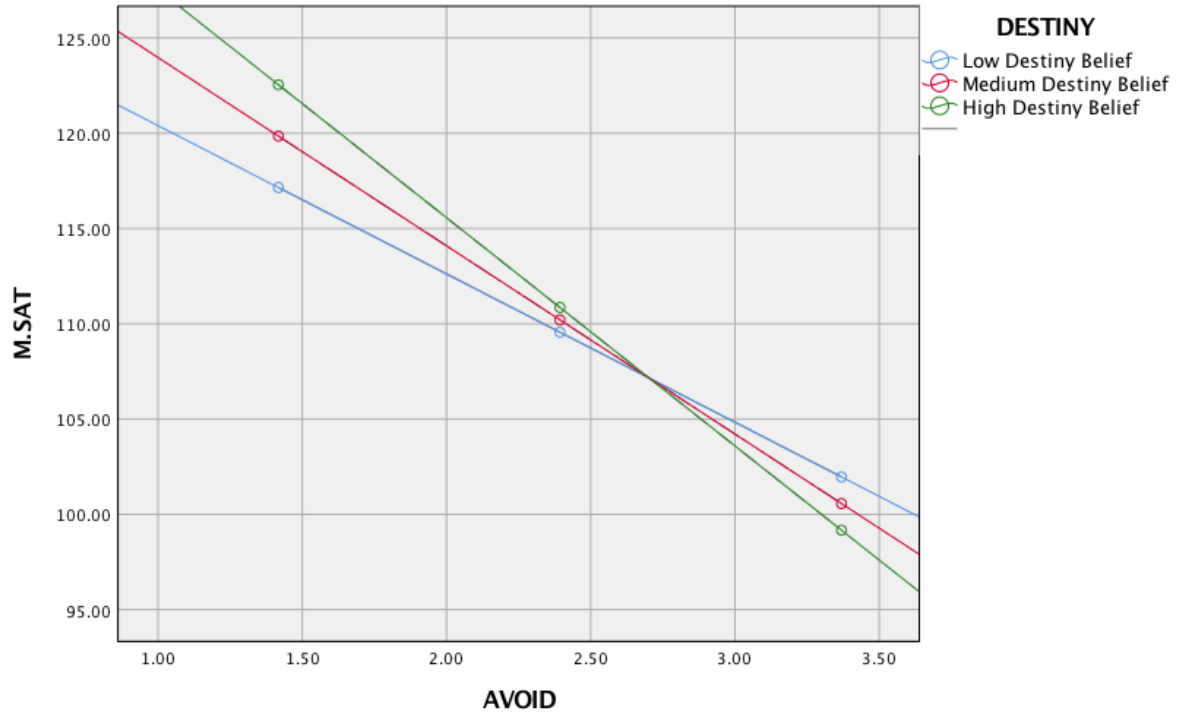


Figure 4. Moderation of Destiny Belief on the relationship between Attachment Avoidance and Marital Satisfaction.

CHAPTER V

Discussion

The aim of this study was to investigate the possible indirect effects implicit theories of relationships have on the association between attachment and marital satisfaction. The results of the current study were consistent with prior research for the relationship between adult attachment and marital satisfaction. Attachment anxiety and attachment avoidance were found to have significant negative total effects on marital satisfaction. This finding has been demonstrated in prior research (Kobak, Ruckdeschel, & Hazan, 1994; Mikulincer et al., 2002). However, this study did not demonstrate support for the indirect effect of implicit theories of relationship on the association between attachment and marital satisfaction nor demonstrate any significant pathways from attachment to implicit theories of relationships or from implicit theories of relationships to marital satisfaction.

There are several possible reasons why I was not able to find significance on the mediated pathway for my proposed model. First, it is possible that the construct of implicit theories of relationships was not adequately measured. Previous research examining associations with this variable have used multiple scales together to measure the construct (Franiuk, Cohen, & Pomerantz, 2002; Franiuk, Shain, Bieritz, & Murray, 2012). Due to the novelty of this variable, the construct may not have been fully captured within the one measure. Further, it is possible that the two variables did not demonstrate significant correlation let alone a predictive relationship due to the differing theoretical orientations from which attachment theory and implicit theory are derived. While research has demonstrated that attachment insecurity is linked with a belief in romantic love or soul mates (Cruces, Hawrylak, & Delegido, 2015; Hart, Hung, Glick, & Dinero,

2012), there has not been research to demonstrate that attachment style impacts or translates to an individual's implicit theories, let alone implicit theories in a relationship.

Secondly, I considered that I mis-specified the model, failing to rule out alternative hypotheses such as moderation of ITR on the relationship between attachment and marital satisfaction. I chose to use a mediation model, theorizing that the internal working models created through attachment behaviors would include implicit theories of relationships. Past research conducted with implicit theories of relationships has demonstrated the variable to be a very influential moderator in romantic relationship associations such as an individual "wanting more" from one's partner and overall satisfaction with the relationship (Knee et al., 2001; Knee et al., 2004).

However, if ITR is not an inherent part of partners' internal working models, then it might be better suited as a moderator variable between attachment and marital satisfaction. To test this theory, I ran four post hoc analyses for the possible moderating effect of either destiny or growth belief on the relationship between attachment anxiety and avoidance and marital satisfaction. Out of these four analyses, destiny belief was found to significantly moderate the relationship between attachment avoidance and marital satisfaction. This moderation is a novel finding in the literature. Prior research has been able to demonstrate a modest correlation between growth belief and attachment security, but no other correlations between either destiny belief or growth belief and attachment insecurity (i.e. anxiety and avoidance; Knee, Patrick, & Lonsbary, 2003). Furthermore, the research that has been done between destiny belief and marital satisfaction has demonstrated a positive correlation between the two variables such that an individual with a high destiny belief often idealizes one's partner and therefore reports higher marital satisfaction (Knee, 1998; Knee & Canevello, 2006).

The current finding coincides with Franiuk, Cohen, and Pomeranz (2002) work demonstrating that individuals who do not feel they are with their current soulmate and have higher destiny belief demonstrate lower overall marital satisfaction. Because destiny belief is an entity theory around relationships, individuals who do not feel securely attached to their partner may then believe that the relationship cannot evolve into something better. Individuals with high attachment avoidance tend to disengage from a relationship when distress occurs (Barry & Lawrence, 2013; Overall, Simpson, Struthers, 2013) while individuals with high attachment anxiety tend to become reactive if commitment and intimacy are not reciprocated in the relationship (De Smet et al., 2013; Ménard & Pincus, 2012; Strawhun, Adams, & Huss, 2013). These differences may help explain why thinking about a possible “soulmate” out in the world would influence individuals with attachment avoidance more so than individuals with attachment anxiety.

The findings suggest a possible link between the intrapersonal nature of attachment theory and the interpersonal nature of implicit theories of relationships. The goal of attachment behavior is to fulfill the need to be safe and secure in a time of distress through the comfort, availability, and reliability of an attachment figure (Finkel & Eastwick, 2015). The goal of implicit theories of relationships is to evaluate and/or cultivate the relationship in order to achieve relationship satisfaction (Knee et al., 2003). In the current study, destiny belief significantly moderates the relationship between attachment avoidance and marital satisfaction. In this way, having a destiny belief, which is high on evaluation and low on cultivation, impacts how an avoidantly-attached individual views the relationship. Therefore, not only may the individual not see the partner as a safe and secure base, but also may not see the relationship as meeting the dyadic goals of satisfaction. Additionally, when the individual does not have high

destiny belief, the insecure attachment does not have as strong a negative influence on marital satisfaction. The combination of not getting either intrapersonal or interpersonal needs met demonstrates the strongest negative effect on marital satisfaction, suggesting a possible systemic link between the theoretical concepts.

While not the proposed model for this study, this initial finding creates an opportunity to further understand how implicit theories of relationships impact an individual's attachment within a specific relationship with regard to relationship satisfaction.

Clinical Implications of the Study Findings

The study results do demonstrate some impressions for clinical work, specifically for attachment and marital satisfaction work with couples. The main results replicated previous research completed on attachment and marital satisfaction, further supporting the possible need for attachment work to be a consideration when working with couples with marital discord. When individuals feel safe and secure in their relationship, they may be more likely to approach relationship distress with availability and reliability which then corresponds with an increase in marital satisfaction (Mikulincer et al., 2002). Therefore, attachment theory and attachment repair may be a helpful consideration in couple therapy.

It appears that a focus on implicit theories of relationship can be helpful in couple's work as well. Implicit theories in general have been shown to be malleable through incremental cognitive restructuring (Dweck, 1996; Erdley & Dweck, 1993). Therefore, clinicians working with individual destiny belief may be able to explore how that impacts the relationship and work towards a more growth belief of relationships. While not demonstrated in this study, previous research has demonstrated that growth beliefs predict healthier, more practical, and more lasting

relationships involving conflict resolution behaviors and forgiveness (Burnette & Franiuk, 2010; Knee & Canevello, 2006).

Limitations and Future Research

Several limitations of the study must be addressed in order to provide a comprehensive review of the findings. First, the participants for this study were limited with regard to racial and gender diversity. This skew in gender and ethnicity makes it difficult to generalize the findings of the research to all people. While the range of length of relationship demonstrates an adequate spread between 1 year and 40 years, further examination of this data demonstrates an extreme positive skew (z skew = 5.03), making a generalization of findings difficult beyond relationships lasting more than 10 years.

Second, the measure of implicit theories of relationships may have been limited in its ability to accurately measure and portray an individual's belief around romantic relationships. The ITR has been substantiated as having construct validity, but due to the newness of the measure, many researchers are still using multiple scales to capture an individual's true implicit theories around relationships (Franiuk, Cohen, & Pomerantz, 2002; Franiuk et al., 2012). Future research could examine many of these scales in association with attachment to further explore the possible pathway between these two variables.

Third, a possible explanation for the moderating effect destiny belief had on the relationship between attachment avoidance and marital satisfaction could be a combination of the differences in wording used in the scales measuring attachment, destiny belief, and marital satisfaction and the order in which the scales were presented to the research participants. Both the ECR-R and the DAS use prompts regarding the current relationship the participant is in. However, the ITR uses wording that asks about romantic relationships in general, not about any

specific romantic relationship. The order in which the participants received these scales was ECR-R, ITR, and DAS. It is possible that those individuals that demonstrated higher attachment avoidance in their current relationship felt discouraged about the relationship when being reminded that there could be a “soulmate” for them in the world and therefore reported lower marital satisfaction. Future research should randomize the order of scales for participants to better control for this possible confounding variable.

Fourth, this study may not have captured other variables that influence the original model. For example, research has shown that relationship maintaining behaviors can often buffer the negative effect attachment insecurity has on marital satisfaction (Kohn et al., 2012; Pepping & Halford, 2012). It was hypothesized that implicit theories of relationships would be derived from some of these behaviors, but it is unclear when and how relationship maintaining behaviors are introduced into a relationship. Unfortunately, this study did not look at specific behaviors in a relationship or usual relationship maintenance practices.

The limitations of this study may provide a basis for future research exploring these constructs. Future research should broaden the participant pool in terms of gender, ethnicity, and length of relationship to better generalize the information as well as determine if there is a significant difference in results between males and females. Secondly, a future study should incorporate multiple scales for implicit theories of relationship in order to capture a better understanding of an individual’s belief. Increasing the construct validity of this variable can provide more information about this construct and lead to further research into the determinants of this variable. Thirdly, the randomization of the order of scales participants receive should be considered for future studies to help control for possible ordering effects. Fourthly, future research should incorporate additional variables that may shape the effect of attachment on

marital satisfaction such as relationship maintenance behaviors and motivations behind those behaviors. This can greatly increase our knowledge regarding the mechanisms at play between the attachment-marital satisfaction relationship. Finally, future research should incorporate a longitudinal design to further examine the possible impact systemic patterns have on attachment style, implicit theories of relationships, and marital satisfaction and explore possible causal links between these constructs over time.

Conclusion

The purpose of this study was to explore the association between adult attachment, implicit theories of relationships, and marital satisfaction for adults who are currently in a romantic relationship. The relationship between attachment and marital satisfaction had been previously supported in research (Kobak, Ruckdeschel, & Hazan, 1994; Mikulincer et al., 2002). However, research had not yet examined how attachment translates to an internal working model about the dyad rather than the individual. I hypothesized that the individual goals of attachment predicted the dyadic goal of marital satisfaction through the use of the motivating perceptions found in implicit theories of relationships. The proposed mediation models failed to demonstrate statistically significant indirect effects. However, the results were able to replicate previous research's findings on the relationship between attachment and marital satisfaction. Additionally, post hoc analysis demonstrated destiny belief as significantly moderating the relationship between attachment avoidance and marital satisfaction. This novel finding demonstrates the influence of implicit theories of relationships on relational perceptions. Although more research is needed to investigate this idea thoroughly, it offers an interesting perspective on how cognitive schemas impact marital satisfaction in a current relationship. Researchers and clinicians may be

able to use these and future findings to help couples and individuals with relational conflicts and dissatisfaction through both attachment theory and cognitive schemas.

References

- Ainsworth, M. S. (1989). Attachments beyond infancy. *American psychologist*, 44(4), 709.
- Ainsworth, M. S. (1993). Attachment as related to mother-infant interaction. *Advances in infancy research*.
- Ainsworth, M. D. S., Blehar, M. C., Waters, E., & Wall, S. (1978). Patterns of attachment. *A psychological study of the strange situation*. Hillsdale, NY: Erlbaum.
- Banse, R. (2004). Adult attachment and marital satisfaction: Evidence for dyadic configuration effects. *Journal of Social and Personal Relationships*, 21(2), 273-282.
- Barry, R. A., & Lawrence, E. (2013). "Don't stand so close to me": An attachment perspective of disengagement and avoidance in marriage. *Journal of Family Psychology*, 27, 484-494.
- Bartholomew, K., & Horowitz, L. M. (1991). Attachment styles among young adults: a test of a four-category model. *Journal of personality and social psychology*, 61(2), 226.
- Baucom, D. H., Sayers, S. L., & Duhe, A. (1989). Attributional style and attributional patterns among married couples. *Journal of Personality and Social Psychology*, 56(4), 596.
- Bowlby, J. (1969). *Attachment and Loss: Attachment; John Bowlby*. Basic Books.
- Bowlby, J. (1980). *Attachment and loss* (Vol. 3). Basic books.
- Bowlby, J. (1988). Developmental psychiatry comes of age. *The American journal of psychiatry*, 145(1), 1.
- Bradbury, T. N., Fincham, F. D., & Beach, S. R. (2000). Research on the nature and determinants of marital satisfaction: A decade in review. *Journal of Marriage and Family*, 62(4), 964-980.

- Bradbury, T. N., Beach, S. R., Fincham, F. D., & Nelson, G. M. (1996). Attributions and behavior in functional and dysfunctional marriages. *Journal of Consulting and Clinical Psychology, 64*(3), 569.
- Brennan, K. A., Clark, C. L., & Shaver, P. R. (1998). Self-report measurement of adult attachment: An integrative overview.
- Brock, R. L., & Lawrence, E. (2008). A longitudinal investigation of stress spillover in marriage: Does spousal support adequacy buffer the effects?. *Journal of Family Psychology, 22*(1), 11.
- Burnette, J. L. & Franiuk, R. (2010). Individual differences in implicit theories of relationships and partner fit: Predicting forgiveness in developing relationships. *Journal of Personality and Individual Differences, 48*, p. 144-148.
- Butzer, B., & Campbell, L. (2008). Adult attachment, sexual satisfaction, and relationship satisfaction: A study of married couples. *Personal relationships, 15*(1), 141-154.
- Carnelley, K. B., Pietromonaco, P. R., & Jaffe, K. (1994). Depression, working models of others, and relationship functioning. *Journal of personality and social psychology, 66*(1), 127.
- Carr, D., Freedman, V. A., Cornman, J. C., & Schwarz, N. (2014). Happy marriage, happy life? Marital quality and subjective well-being in later life. *Journal of Marriage and Family, 76*(5), 930-948.
- Carr, D., & Springer, K. W. (2010). Advances in families and health research in the 21st century. *Journal of Marriage and Family, 72*(3), 743-761.
- Census Bureau. (2009). *Statistical abstract of the United States*. Government Printing Office.

- Chopik, W. J., Moors, A. C., & Edelstein, R. S. (2014). Maternal nurturance predicts decreases in attachment avoidance in emerging adulthood. *Journal of Research in Personality, 53*, 47–53.
- Chung, M. S. (2014). Pathways between attachment and marital satisfaction: The mediating roles of rumination, empathy, and forgiveness. *Personality and Individual Differences, 70*, 246-251.
- Cohen, P. M. (1985). Family measurement techniques. *The American Journal of Family Therapy, 13*, 66–70.
- Cowan, C. P., & Cowan, P. A. (1992). *When partners become parents: The big life change for couples*. New York: Basic Books.
- Cruces, J. M. S., Hawrylak, M. F., & Delegido, A. B. (2015). Interpersonal variability of the experience of falling in love. *International Journal of Psychology & Psychological Therapy, 15*, 87–100.
- De Smet, O., Loeys, T., & Buysse, A. (2013). Ex-couples' unwanted pursuit behavior: An actor-partner interdependence model approach. *Journal of Family Psychology, 27*, 221–231.
- Dillow M. R., Goodboy, A. K., & Bolkan, S (2014). Attachment and the expression of affection in romantic relationships: The mediating role of romantic love. *Communication Reports, 27*(2), 102-115.
- Dweck, C. S. (1996). Implicit theories as organizers of goals and behavior.
- Eidelson, R. J., & Epstein, N. (1982). Cognition and relationship maladjustment: Development of a measure of dysfunctional relationship beliefs. *Journal of consulting and clinical psychology, 50*(5), 715.

- Erdley, C. A., & Dweck, C. S. (1993). Children's implicit personality theories as predictors of their social judgments. *Child development, 64*(3), 863-878.
- Faul, F., Erdfelder, E., Lang, A. G., & Buchner, A. (2007). G* Power 3: A flexible statistical power analysis program for the social, behavioral, and biomedical sciences. *Behavior research methods, 39*, 175-191. Retrieved from <http://www.springer.com/psychology/cognitive+psychology/journal/13428>
- Field, A. (2005). *Discovering statistics with SPSS*.
- Fincham, F. D. (1985). Attribution processes in distressed and nondistressed couples: II. Responsibility for marital problems. *Journal of Abnormal Psychology, 94*(2), 183.
- Fincham, F. D., Beach, S. R., & Bradbury, T. N. (1989). Marital distress, depression, and attributions: Is the marital distress-attribution association an artifact of depression?. *Journal of Consulting and Clinical Psychology, 57*(6), 768.
- Fincham, F. D., & Bradbury, T. N. (1987). The assessment of marital quality: A reevaluation. *Journal of Marriage and the Family, 797-809*.
- Fincham, F. D., & Bradbury, T. N. (1993). Marital satisfaction, depression, and attributions: A longitudinal analysis. *Journal of personality and social psychology, 64*(3), 442.
- Fincham, F. D., Bradbury, T. N., Arias, I., Byrne, C. A., & Karney, B. R. (1997). Marital violence, marital distress, and attributions. *Journal of Family Psychology, 11*(3), 367.
- Finkel, E. J., & Eastwick, P. W. (2015). Interpersonal attraction: In search of a theoretical Rosetta Stone. In M. Mikulincer, P. R. Shaver, J. A. Simpson, J. F. Dovidio, M. Mikulincer, P. R. Shaver, ... J. F. Dovidio (Eds.), *APA handbook of personality and social psychology, Volume 3: Interpersonal relations* (pp. 179-210). Washington, DC: American Psychological Association.

- Fraley, R. C., Hudson, N. W., Heffernan, M. E., & Segal, N. (2015). Are adult attachment styles categorical or dimensional? A taxometric analysis of general and relationship-specific attachment orientations. *Journal of Personality and Social Psychology, 109*(2), 354.
- Fraley, R. C., & Shaver, P. R. (2000). Adult romantic attachment: Theoretical developments, emerging controversies, and unanswered questions. *Review of General Psychology, 4*(2), 132-154. doi: 10.1037//1089-2680.4.2.132
- Fraley, R. C., & Waller, N. G. (1998). Adult attachment patterns: A test of the typological model.
- Fraley, R. C., Waller, N. G., & Brennan, K. A. (2000). An item response theory analysis of self-report measures of adult attachment. *Journal of Personality and Social Psychology, 78*, 350–365. doi: 10.1037//0022-3514.78.2.350
- Fraley, R. C., Waller, N. G., & Brennan, K. A. (2000b). Experiences in Close Relationships Questionnaire—Revised [Database record]. Retrieved from PsycTESTS. doi: <http://dx.doi.org/10.1037/t03763-000>
- Franiuk, R., Cohen, D., & Pomerantz, E. M. (2002). Implicit theories of relationships: Implications for relationship satisfaction and longevity. *Personal Relationships, 9*(4), 345-367.
- Franiuk, R., Shain, E., Bieritz, L., & Murray, C. (2012). Relationship theories and relationship violence: Is it beneficial to believe in soulmates? *Journal of Social and Personal Relationships, 29*(6), p. 820-838. doi: 10.1177/0265407512444374
- Gilford, R., & Bengtson, V. (1979). Measuring marital satisfaction in three generations: Positive and negative dimensions. *Journal of Marriage and the Family, 38*7-398.

- Givertz, M., Woszidlo, A., Segrin, C., & Knutson, K. (2013). Direct and indirect effects of attachment orientation on relationship quality and loneliness in married couples. *Journal of Social and Personal Relationships, 30*(8), 1096-1120.
- Graham, J. M., Diebels, K. J., & Barnow, Z. B. (2011). The reliability of relationship satisfaction: a reliability generalization meta-analysis.
- Hart, J. J., Hung, J. A., Glick, P., & Dinero, R. E. (2012). He loves her, he loves her not: Attachment style as a personality antecedent to men's ambivalent sexism. *Personality and Social Psychology Bulletin, 38*, 1495–1505.
- Hayes, A. F. (2013). *Introduction to mediation, moderation, and analysis: A regression-based approach*. New York, NY: The Guilford Press.
- Hazan, C., & Shaver, P. (1987). Romantic love conceptualized as an attachment process. *Journal of personality and social psychology, 52*(3), 511.
- Heider, F. (1944). Social perception and phenomenal causality. *Psychological review, 51*(6), 358-374.
- Hendrick, C., & Hendrick, S. (1986). A theory and method of love. *Journal of personality and social psychology, 50*(2), 392.
- Johnson, E., & Huston, T. L. (1998). The perils of love, or why wives adapt to husbands during the transition to parenthood. *Journal of Marriage and the Family, 60*, 195–204.
- Johnson, M. D., Cohan, C. L., Davila, J., Lawrence, E., Rogge, R. D., Karney, B. R., ... & Bradbury, T. N. (2005). Problem-solving skills and affective expressions as predictors of change in marital satisfaction. *Journal of consulting and clinical psychology, 73*(1), 15.
- Jones, J. T., & Cunningham, J. D. (1996). Attachment styles and other predictors of relationship satisfaction in dating couples. *Personal Relationships, 3*(4), 387-399.

- Kammrath, L. K., & Dweck, C. (2006). Voicing conflict: Preferred conflict strategies among incremental and entity theorists. *Personality and Social Psychology Bulletin*, 32(11), 1497-1508. doi: 10.1177/0146167206291476
- Kammrath, L. & Peetz, J. (2012). You promised you'd change: How incremental and entity theorists react to a romantic partner's promised change attempts. *Journal of Experimental Social Psychology*, 48, p. 570-574. doi: 10.1016/j.jesp.2011.10.015
- Karantzas, G. C., Feeney, J. A., Goncalves, C. V., & McCabe, M. P. (2014). Towards an integrative attachment-based model of relationship functioning. *British journal of psychology*, 105(3), 413-434.
- Karney, B. R., Bradbury, T. N., Fincham, F. D., & Sullivan, K. T. (1994). The role of negative affectivity in the association between attributions and marital satisfaction. *Journal of Personality and Social Psychology*, 66(2), 413.
- Kelly, G. A. (1955). A theory of personal constructs. *New York: Norton. Nellie Ismail, Tan Jo-Pei and Rahimah Ibrahim pre-to postnatal period. Journal of Reproductive and Infant Psychology*, 19(2), 83-110.
- Kennedy, S., & Bumpass, L. (2008). Cohabitation and children's living arrangements: New estimates from the United States. *Demographic research*, 19, 1663.
- Klohnen, E. C., & Bera, S. (1998). Behavioral and experiential patterns of avoidantly and securely attached women across adulthood: A 31-year longitudinal perspective. *Journal of Personality and Social Psychology*, 74, 211–223.
- Knee, C. R. (1998). Implicit theories of relationships: Assessment and prediction of romantic relationship initiation, coping, and longevity. *Journal of Personality and Social Psychology*, 74 (2), p.360-370.

- Knee, C. R. & Canevello, A. (2006). Implicit theories of relationships and coping in romantic relationships. In K. Vohs and E. Finkel, (Eds.), *Self and Relationships: Connecting Intrapersonal and Interpersonal Processes* (p.160-176). New York, NY, USA: Guilford Press.
- Knee, C. R., Nanayakkara, A., Vietor, N. A., Neighbors, C., & Patrick, H. (2001). Implicit theories of relationships: Who cares if romantic partners are less than ideal? *Personality and Social Psychology Bulletin*, 27(7), p. 808-819.
- Knee, C. R., Patrick, H., & Lonsbary, C. (2003). Implicit theories of relationships: Orientations toward evaluation and cultivation. *Personality and Social Psychology Review*, 7(1), 41-55.
- Knee, C. R., Patrick, H., Vietor, N. A., & Neighbors, C. (2004). Implicit theories of relationships: Moderators of the link between conflict and commitment. *Personality and Social Psychology Bulletin*, 30(5), 617-628.
- Kobak, R. R., & Hazan, C. (1991). Attachment in marriage: Effects of security and accuracy of working models. *Journal of Personality and social Psychology*, 60(6), 861.
- Kobak, R., Ruckdeschel, K., & Hazan, C. (1994). From symptom to signal: An attachment view of emotion in marital therapy. In S. M. Johnson & L. S. Greenberg (Eds.), *The heart of the matter: Perspectives on emotion in marital therapy* (pp. 46–71). New York: Brunner/Mazel.
- Kohn, J. L., Rholes, W. S., Simpson, J. A., Martin, A. M., III, Tran, S., & Wilson, C. L. (2012). Changes in marital satisfaction across the transition to parenthood: The role of adult attachment orientations. *Personality and Social Psychology Bulletin*, 38, 1506–1522.
- Levenson, R. W., & Gottman, J. M. (1985). Physiological and affective predictors of change in

- relationship satisfaction. *Journal of Personality and Social Psychology*, 49, 85–94.
- Levy-Shiff, R., Goldschmidt, I., & Har-Even, D. (1991). Transition to parenthood in adoptive families. *Developmental Psychology*, 27, 131–140.
- Madey, S. F., & Rodgers, L. (2009). The effect of attachment and Sternberg's triangular theory of love on relationship satisfaction. *Individual Differences Research*, 7(2), 76-84.
- Main, M., Hesse, E., & Kaplan, N. (2005). Predictability of attachment behavior and representational processes at 1, 6, and 19 years of age. *Attachment from infancy to adulthood: The major longitudinal studies*, 245-304.
- Main, M., Kaplan, N., & Cassidy, J. (1985). Security in infancy, childhood, and adulthood: A move to the level of representation. In I. Bretherton & E. Waters (Eds.), *Growing points in attachment theory and research. Monographs of the Society for Research in Child Development*, 50 (1-2, Serial No. 209), 66-106.
- Marks, M., Wieck, A., Checkly, S., & Kumar, C. (1996). How does marriage protect women with histories of affective disorder from post-partum relapse? *British Journal of Medical Psychology*, 69, 329–342.
- McLanahan, S., & Bumpass, L. (1988). Intergenerational consequences of family disruption. *American Journal of Sociology*, 94, 130–152.
- Ménard, K. S., & Pincus, A. L. (2012). Predicting overt and cyber stalking perpetration by male and female college students. *Journal of Interpersonal Violence*, 27, 2183–2207.
- Meyers, S. A., & Landsberger, S. A. (2002). Direct and indirect pathways between adult attachment style and marital satisfaction. *Personal Relationships*, 9(2), 159-172.

- Mikulincer, M., Florian, V., Cowan, P. A., & Cowan, C. P. (2002). Attachment security in couple relationships: A systemic model and its implications for family dynamics. *Family process, 41*(3), 405-434.
- Morey, J. N., Gentzler, A. L., Creasy, B., Oberhauser, A. M., & Westerman, D. (2013). Young adults' use of communication technology within their romantic relationships and associations with attachment style. *Computers in Human Behavior, 29*, 1771–1778.
- Nie, N. H., Bent, D. H., & Hull, C. H. (1970). *SPSS: Statistical package for the social sciences* (No. HA29 S6). New York: McGraw-Hill.
- Noftle, E. E., & Shaver, P. R. (2006). Attachment dimensions and the big five personality traits: Associations and comparative ability to predict relationship quality. *Journal of research in personality, 40*(2), 179-208.
- Osterhout, R. E., Frame, L. E., & Johnson, M. D. (2011). Maladaptive attributions and dyadic behavior are associated in engaged couples. *Journal of Social and Clinical Psychology, 30*(8), 787-818.
- Overall, N. C., Girme, Y. U., Lemay Jr, E. P., & Hammond, M. D. (2014). Attachment anxiety and reactions to relationship threat: The benefits and costs of inducing guilt in romantic partners. *Journal of Personality and Social Psychology, 106*(2), 235.
- Overall, N. C., Simpson, J. A., & Struthers, H. (2013). Buffering attachment-related avoidance: Softening emotional and behavioral defenses during conflict discussions. *Journal of Personality and Social* 854–871.
- Parker, M. L., Tambling, R. B., & Campbell, K. (2013). Dyadic adjustment and depressive symptoms: the mediating role of attachment. *The Family Journal, 21*(1), 28-34.

- Pepping, C. A., & Halford, W. K. (2012). Attachment and relationship satisfaction in expectant first-time parents: The mediating role of relationship enhancing behaviors. *Journal of Research in Personality, 46*(6), 770-774.
- Rholes, W. S., Kohn, J. L., & Simpson, J. A. (2014). A longitudinal study of conflict in new parents: The role of attachment. *Personal Relationships, 21*, 1–21.
- Ross, M. (1989). Relation of implicit theories to the construction of personal histories. *Psychological review, 96*(2), 341.
- Saavedra, M. C., Chapman, K. E., & Rogge, R. D. (2010). Clarifying links between attachment and relationship quality: Hostile conflict and mindfulness as moderators. *Journal of Family Psychology, 24*, 380–390.
- Shaver, P. R., & Brennan, K. A. (1992). Attachment styles and the " Big Five" personality traits: Their connections with each other and with romantic relationship outcomes. *Personality and Social Psychology Bulletin, 18*(5), 536-545.
- Sibley, C. G., Fischer, R., & Liu, J. H. (2005). Reliability and validity of the revised experiences in close relationships (ECR-R) self-report measure of adult romantic attachment. *Personality and Social Psychology Bulletin, 31*(11), 1524-1536.
- Spanier, G. B. (1976). Measuring dyadic adjustment: New scales for assessing the quality of marriage and similar dyads. *Journal of Marriage and the Family, 15*-28.
- Spanier, G. B., & Thompson, L. (1982). A confirmatory analysis of the Dyadic Adjustment Scale. *Journal of Marriage and the Family, 731*-738.
- Sprecher, S., & Metts, S. (1989). Development of the Romantic Beliefs Scale and examination of the effects of gender and gender-role orientation. *Journal of Social and Personal Relationships, 6*(4), 387-411.

- Sroufe, L. A., & Waters, E. (1977). Attachment as an organizational construct. *Child development*, 1184-1199.
- Strawhun, J., Adams, N., & Huss, M. T. (2013). The assessment of cyberstalking: An expanded examination including social networking, attachment, jealousy, and anger in relation to violence and abuse. *Violence and Victims*, 28, 715–730.
- Tabachnick, B. G., & Fidell, L. S. (2007). *Using multivariate statistics*. Allyn & Bacon/Pearson Education.
- Thoburn, J.W. & Sexton, T.L. (2016). *Family psychology: Theory, research and practice*. Westport CT: Praeger Press.
- Thomas, G., Fletcher, G. J. O., & Lange, C. (1997). Online empathic accuracy in marital interaction. *Journal of Personality and Social Psychology*, 72, 839–850.
- Towler, A. J., & Stuhlmacher, A. F. (2013). Attachment styles, relationship satisfaction, and well-being in working women. *The Journal of social psychology*, 153(3), 279-298.
- Vorauer, J. D., Cameron, J. J., Holmes, J. G., & Pearce, D. G. (2003). Invisible overtures: Fears of rejection and the signal amplification bias. *Journal of Personality and Social Psychology*, 84(4), 793.
- Weigel, D. J., Davis, B. A., & Woodard, K. C. (2015). A two-sided coin: Mapping perceptions of the pros and cons of relationship commitment. *Journal of Social and Personal Relationships*, 32(3), 344-367.
- Whisman, M. A., & Allan, L. E. (1996). Attachment and social cognition theories of romantic relationships: Convergent or complementary perspectives?. *Journal of Social and Personal Relationships*, 13(2), 263-278.