

Antioch University

## AURA - Antioch University Repository and Archive

---

Antioch University Full-Text Dissertations &  
Theses

Antioch University Dissertations and Theses

---

2012

### Fatherhood and a Partner's Postpartum Depression: Coping, Relationship Satisfaction, Gender Roles, and Empathy

Martha G. Ruiz

*Antioch University - Santa Barbara*

Follow this and additional works at: <https://aura.antioch.edu/etds>



Part of the [Clinical Psychology Commons](#), [Family, Life Course, and Society Commons](#), and the [Feminist, Gender, and Sexuality Studies Commons](#)

---

#### Recommended Citation

Ruiz, M. G. (2012). Fatherhood and a Partner's Postpartum Depression: Coping, Relationship Satisfaction, Gender Roles, and Empathy. <https://aura.antioch.edu/etds/50>

This Dissertation is brought to you for free and open access by the Antioch University Dissertations and Theses at AURA - Antioch University Repository and Archive. It has been accepted for inclusion in Antioch University Full-Text Dissertations & Theses by an authorized administrator of AURA - Antioch University Repository and Archive. For more information, please contact [hhale@antioch.edu](mailto:hhale@antioch.edu).

**FATHERHOOD AND A PARTNER'S POSTPARTUM DEPRESSION:  
COPING, RELATIONSHIP SATISFACTION, GENDER ROLES, AND  
EMPATHY**

A dissertation submitted

by

Martha G. Ruiz

To

ANTIOCH UNIVERSITY SANTA BARBARA

in partial fulfillment of  
the requirements for the  
degree of

DOCTOR OF PSYCHOLOGY  
in  
CLINICAL PSYCHOLOGY

---

Salvador Treviño, Ph.D.  
Dissertation Chair

---

Sharleen O'Brien, Psy.D.  
Faculty

---

Garret Wyner, Ph.D.  
Student Reviewer

---

Deborah L. Moffett, Ph.D.  
External Expert

## **Abstract**

The present study focused on assessing differences in new father's coping styles when living with a partner suffering from symptoms of postpartum depression. It further investigated whether a relationship existed between father's coping style and their level of relationship satisfaction, empathy, and views on gender. Five fathers, between the ages of 27 and 46 volunteered their participation in this study. Fathers were recruited through their partners from medical and mental health clinics and agencies offering services to new mothers or mothers suffering from symptoms of postpartum depression. The Coping Responses Inventory (CRI) was utilized to determine if differences existed in father's coping. The Relationship Assessment (RAS), Interpersonal Reactivity Index (IRI), and Sex-Role Egalitarianism Scale, Form BB (SRES), assisted in measuring level of relationship satisfaction, empathy and gender roles, respectively. To assist with the completion of this study, a quantitative research design was selected and applied. The use of a case study approach was further implemented to articulate if there was uniformity or differences in father's coping styles and to examine any associations between fathers coping and their level of relationship satisfaction, empathy, and views on gender. Hypotheses were then tested across the five case studies. The study found that fathers differ in coping styles when their partners are suffering from symptoms of postpartum depression. Significant associations were

not found between coping, and father's level of relationship satisfaction, empathy and views on gender. The electronic version of this dissertation can be found at the OhioLink ETD Center, [www.ohiolink.edu/etd](http://www.ohiolink.edu/etd).

## **Acknowledgments**

The following dissertation, while an individual work, benefited from the insight and direction of several people. It is, therefore, that I express my deepest appreciation to my dissertation committee, Dr. Salvador Treviño, Dr. Sharleen O'Brien, Dr. Deborah Moffett, and Dr. Garret Wyner. Without their instrumental support, patience, and guidance this study would have not been completed. Additionally, I would like to acknowledge Dr. Ryan Sharma and Dr. Barbara Lipinski for their support during the beginning stages of this study.

This academic achievement would have not been possible without the on-going support and encouragement of my parents, Martha and Martin Ruiz. From the bottom of my heart, I would like to thank them for believing in me, for their unconditional love, and for being the glue that has held me together all these years.

I would also like to thank the many others who have supported me throughout this journey, including my boyfriend, Jesse, my brothers, Martin, Gerardo, and Isaac, and my dear friends and colleagues. Most importantly, I am thankful for the omnipresent God, for giving me the strength and courage to complete this study.

This dissertation is dedicated to Isabella Hernandez, Isaac and Adrian Ruiz.

## Table of Contents

	Page
Abstract .....	ii
Acknowledgments .....	iiv
CHAPTER I: Introduction .....	1
Theoretical Framework .....	8
Statement of Significance .....	8
Research Approach .....	9
Research Questions .....	11
CHAPTER II: Review of the Literature .....	13
Coping and Coping Styles .....	13
Coping with Partner's Postpartum Depression .....	16
Gender, Gender Roles, Coping, and Depression .....	18
Relationship Satisfaction .....	23
Empathy .....	26
Living with a Partner Suffering from Postpartum Depression .....	29
Postpartum Depression and Other Disorders .....	30
Postpartum Depression .....	30
Postpartum Depression and DSM-IV-TR .....	34
Paternal Postpartum Depression .....	36
Diagnostic Characteristics .....	40
Screening for Depression .....	42
Risks of Postpartum Depression .....	44
Summary of Reviewed Literature .....	45
CHAPTER III: Methodology .....	47
Research Design and Philosophies .....	48
Independent and Dependent Variables .....	51
Strengths and Limitations .....	52
Research Questions and Hypotheses .....	53
Recruitment of Participants .....	56
Description of Instruments .....	59
Potential Risks and Benefits for Participants .....	65
Data Analysis .....	68

CHAPTER IV: Results .....	69
Description of Sample.....	71
Hypothesis Testing.....	72
Summary of Hypotheses Testing.....	94
Summary of Results.....	96
CHAPTER V: Discussion and Conclusion.....	97
Review of Major Findings .....	98
General Discussion .....	105
Implications.....	107
Recommendations.....	110
Limitations .....	111
Areas for Future Research .....	112
Conclusion .....	113
REFERENCES .....	114
Appendix A: Informed Consent Form .....	128
Appendix B: Recruit Letter.....	130
Appendix D: Demographic Questionnaire.....	136
Appendix E: Interpersonal Reactivity Index (IRI).....	138
Appendix F: Relationship Assessment Scale.....	141

## **CHAPTER I: Introduction**

Fathers are beset with an array of challenges during the postnatal period, but little is known regarding the coping styles of fathers living with a depressed partner. Further, no published studies to date have explored fathers' coping responses to their partners' symptoms of postpartum depression (PPD) in the context of their level of empathy, relationship satisfaction, and gender roles. PPD research has largely focused on the mother experiencing depression, with a paucity of research focused on the father, opening a new and important area of research for the clinical psychology community.

PPD, the depressive symptoms that may occur surrounding the prenatal and postnatal period, was first characterized in 1858 by Louis Victor Marcé, MD, in writings regarding psychiatric disorders of women during and following pregnancy (Trede, Baldessarini, Viguera, & Bottero, 2009). According to Allen (2010), the work of Marcé served as "one of the first reported descriptions and validations of negative emotional reactions for mothers giving birth to a child" (p. 4). According to Trede et al. (2009), Marcé acknowledged differences in mental illnesses associated with pregnancy, but this observation was ignored for 150



years. The work of Marcé, when rediscovered, served as a foundation to explore the high risk of depression in pregnancy (Trede et al., 2009).

PPD is common, affecting 11% to 18% of mothers (Centers for Disease Control and Prevention, 2012). However, the mother is not the only one affected. The birth of a newborn can bring profound changes in the family system, while simultaneously causing parents to experience a multitude of adjustments in their relationship. Changes such as sleep disturbances, physical and mental exhaustion, or financial issues, among other factors, may pose strain in a relationship. According to Deave and Jonhson (2008), the birth of an offspring is accompanied with stressful events and significantly impacts the family life cycle. In some cases, this can lead to family crisis (Diemer, 1997).

The arrival of a newborn may require fathers to draw upon coping skills. Against the backdrop of a depressed partner, the cumulative strain may overwhelm a father's capacity to cope. According to Beutler, Brookman, Harwood, Alimohamed, and Malik (2001), coping skills are essential, reflecting the effectiveness of an individual's responses to stressful situations. Protective factors may enhance fathers' adjustment, leading to resilience and effective coping. For example, in the context of a satisfying relationship, a new father's great sense of empathy, along with a flexible and evolving gender self-perception

as a man, may be a point of strength or solid foundation within the family system. Nonetheless, little is known regarding how perceived gender roles, relationship satisfaction, and empathy may be related to coping strategies in fathers with partners who are experiencing symptoms of PPD.

While research in the postnatal period has primarily focused on mothers, fathers may suffer from similar symptoms during this period, such as anxiety, depression, and loss of intimacy in their marital relationship. Furthermore, they may feel rejected by their child, fear that their partner will not recover, and experience confusion about PPD (Davey, Dziurawiec, & O'Brien-Malone, 2006). Paulson, Dauber, and Leiferman (2006) showed that 10% of fathers struggle with moderate to severe depression in the first year following the birth of a child. In Goodman's (2004) meta-analysis of 20 studies discussing postnatal experiences in mothers and fathers, only a limited number addressed paternal experiences with PPD.

The limited research that has been conducted concerning men's experiences living with a partner suffering from PPD indicate a significant deficit in health care services for fathers (Buist, Morse, & Durkin, 2002; Letourneau, Duffet-Leger, Dennis, Stewart, & Tryphonopoulos, 2011). A current pilot study focusing on identifying the support needs of fathers affected by PPD found that

all (11) participants in the study experienced some form of obstacle to obtaining information on PPD. They did not know where to look for resources, they felt ignored by health care professionals and in some cases, they were even disallowed from accompanying their partners to treatment (Letourneau et al., 2011).

Even worse, the available professional help may disregard or downplay symptoms in the father when the partner has PPD. In their study, Meghan, Davis, Thomas, and Droppleman (1999) explored the understanding of PPD and its impact on the family through the experiences of 8 fathers and found that 50% of the men reported that health care professionals and others tended to minimize their experience with their spouses PPD. Participants in this study also expressed high interest in supporting their spouses, but said they were unable to do so as a result of barriers they encountered. Other studies indicate that men are likely to benefit if help is made available. For instance, some studies have shown that support groups for fathers during the antenatal and postnatal period provide much needed information, increase their level of understanding about partners' experiences, and reduce strain in the relationship (Premberg & Lundgren, 2006; Purdom, Lucas, & Miller, 2006). Further research alludes to fathers' coping during the postpartum period but does not elaborate to the extent of distinguishing

coping styles (Letourneau et al., 2011; Meghan et al., 1999). One study, however, found that participation in a father's support group helped some men cope with their partners' depression (Davey et al., 2006).

The present study was rooted in the investigator's personal experience working with mothers suffering symptoms of PPD at a community non-profit organization. To assist with case conceptualization, the writer focused on obtaining a contextual understanding of each individual client and her role as a partner, mother, daughter, and sister. After developing a thorough understanding of each case, the writer primarily became interested in clients' relationships with their partners, as it became evident that their level of relationship satisfaction significantly impacted their mental health state and sense of self. These troubled new mothers often shared that they felt misunderstood by their partners and felt rejected in their attempts to turn to them for emotional support. In addition, this researcher noted certain patterns in the way fathers coped with their partners' symptoms of PPD. Some fathers were more actively involved by providing emotional support or seeking help, while others withdrew by engaging in other activities or working longer hours.

Therefore, this writer's structural therapeutic approach influenced her to involve fathers during the weekly therapeutic sessions with their partner. The

investigator was cognizant of their strenuous work schedules and offered them the option to participate in two to three sessions. When fathers participated, it was noted that they were unfamiliar with the definition and symptoms of PPD. They shared rigid thoughts about their roles as fathers and often minimized their partners' emotional pain. In some cases, their lack of attunement was influenced by their cultural beliefs and gender expectations. Some fathers emphasized that their wives were home all day and should be responsible for the infant and household chores and in most cases for the well-being of the other children. Others voiced the belief that their wives were overreacting to symptoms of depression.

Alternatively, some fathers were emotionally available, attuned to, and supportive of their wives. Although their partners struggled with depressive symptoms, they did not appear to be as overburdened as the other clients by the weight of household chores. They seemed more open about their feelings and less concerned about being judged. Notably, even the fathers who provided support and understanding were unfamiliar with the definition and symptoms of PPD.

Following as few as two sessions that included fathers, women reported noteworthy behavioral and emotional changes in their partners. Simple psychoeducation and validation of their experiences appeared to make new fathers

more engaged in their roles as partners and parents. Besides the births of their new infants, other stressors such as job responsibilities, financial stressors, and having to adapt to changes in a partner now struggling with despair significantly impacted these new fathers.

The discovery of the lack of research in this area coupled with new fathers' experiences with their partners' PPD motivated the researcher to investigate fathers' coping styles while simultaneously examining three theorized factors impacting men's capacity to cope with their partners' symptoms of PPD. These factors include relationship satisfaction, empathy, and gender roles. Many authors have noted that the level of relationship satisfaction in couples has a powerful impact on PPD in women (Page & Wilhelm, 2007). In their research, Misri, Kostaras, Fox, and Kostaras (2000), found that "a woman's perception of her partner's support helps increase her sense of well-being as a woman, wife and mother" (p. 557). Vaughn and Matyastik-Baier (1999) noted that couples who perceived their relationship as egalitarian engaged in fewer power struggles. Moreover, research consistently found that the one component assisting partners to cope with their significant others' PPD was a partner's psychological support (Kim & Swain, 2007; Page & Wilhelm, 2007; Paulson & Bazemore, 2010).

**Theoretical Framework**

Dr. Rudolph H. Moos' (1993b) theoretical coping framework was adopted to determine coping styles in fathers. His theory combines two approaches to classify coping. The first approach emphasizes a person's orientation and response to the stressor: for instance, by approaching the problem and making active efforts to resolve it, or by avoiding the problem. The second approach emphasizes the method of coping people employ: behavioral or cognitive. For example, do individuals perceive problems or stressors through behavioral or cognitive attempts to solve the issue? To understand which of these two approaches the participants in the study used, the researcher administered Moos' (1993a) Coping Responses Inventory.

**Statement of Significance**

This line of investigation may potentially prompt medical and mental health professionals, along with other professionals in the field of psychology, to: screen fathers routinely during the postnatal period; learn about their coping styles; encourage their participation in services provided to their partners; or develop support groups, psychoeducational handouts, or resources specific to fathers' needs during this period. Most importantly, this research may prompt the development of therapeutic skills or interventions that can assist fathers to better

cope with their spouses' symptoms of PPD or during the postnatal period in general.

### **Research Approach**

A quantitative research design was selected to investigate individual coping styles and their association with relationship satisfaction, empathy, and gender roles. This philosophical orientation is also described by the term *positivism*, which derives from the scientific method used in the physical sciences and from 19<sup>th</sup> century writers (Carr, 1994; Creswell, 2009). The selection of variables in this study was guided by the writer's personal perceptions about human behaviors and actions, clinical work with clients suffering from postpartum depressive symptoms, as well as academic work and training addressing mood disorders both pre- and postpartum. This research design was intended to help test the writer's philosophical belief that one factor might be associated or might impact another. Thus, a woman's symptoms of PPD may be associated with changes in the dynamics of her relationship, which may create difficulties for her partner.

Creswell (2009) indicates that quantitative research aims to develop and employ mathematical models, theories, or hypotheses pertaining to phenomena. Variables, in turn, can be measured, normally on instruments to analyze data. As



part of this quantitative method, a survey design was selected to provide a numeric description of trends, attitudes, or opinions of the sampled population being studied. Therefore, four questionnaires were selected. Questionnaires were selected according to their validity and reliability, as well as those that correlated highly with the theorized variables. Although the researcher was strongly inclined to conduct this study with members of the Spanish-speaking population, this raised the issue of translation, which would have detracted from the questionnaires' validity and reliability. Therefore, the researcher chose to conduct the study only with English-speaking participants.

Coping styles may be similar among fathers living with a partner suffering from symptoms of PPD, but it is also possible that these fathers differ in their coping styles. To determine whether fathers differed in their coping styles, quantitative assessments were used. Similarly, empathy, relationship satisfaction, and gender roles are quantifiable, and the goal of this study was to assess how these variables vary in individuals in the context of their coping style. To investigate these differences, a case study approach, which is normally used in qualitative research, was also adopted. This approach was taken merely to distinguish whether there is uniformity or differences in fathers' coping styles through quantifiable measures, in the context of their empathy, relationship

satisfaction, and gender roles in living with a partner suffering from PPD. Based on these goals, the following research questions were developed.

### **Research Questions**

Four research questions were addressed in this study.

Research Question 1: *Do men cope differently with their partners' postpartum depression?*

Research Question 2: *What is the level of relationship satisfaction in fathers when living with a partner suffering from postpartum depression and how does it relate to coping?*

Research Question 3: *Do fathers express empathy differently when living with a partner suffering from postpartum depression and how does it relate to coping?*

Research Question 4: *Do fathers differ in gender role views and how do they relate to coping?*

The following chapter provides a review of pertinent literature on coping and coping styles; fathers' characteristics, roles, and experiences as they cope with their partners' PPD; and research on each theorized variable (relationship satisfaction, gender roles, and empathy), as well as their relationship to coping. The history of PPD, both in men and women, risk for PPD, and current diagnostic

criteria are also reviewed. In the methodology chapter, the data collection process and analysis plan are detailed. In the results chapter, the data are analyzed using a case study approach. The discussion chapter concludes this dissertation with a summary of major findings in the context of reviewed literature, including implications, limitations, and areas for future research.

## **CHAPTER II: Review of the Literature**

### **Coping and Coping Styles**

The postpartum period encompasses numerous changes, such as sleep disturbances, caring for the constant demands of a newborn, hormone changes, and other family responsibilities, all of which can create a sense of stress (Page & Wilhelm, 2007). The added stress of a child's birth, whether planned or unplanned, triggers an individual to draw upon acquired coping skills. Coping skills are essential in that they reflect the effectiveness of an individual's response to stressful situations (Beutler et al., 2001). Matud (2000) and Seiffge-Krenke (2006) define coping as a constant change in cognitive and behavioral patterns to manage specific external or internal demands appraised as taxing or that exceed a person's resources. Similarly, Diemer (1997) defines it as a set of social skills that a person acquires and implements when encountering stress in the environment.

Folkman and Moskowitz (2000) and Matud (2004) identify coping as having two functions, regulation of distress and management of problems that are causing the distress. Folkman and Moskowitz (2000) further posited that coping is influenced by the way in which the stressful situation is characterized, its controllability and the individual's social resources, as well as an individual's

personality, disposition, and temperament (Beutler et al., 2001). Therefore, individuals vary widely in the way they respond to stressful life events (Page & Wilhelm, 2007). For purposes of the study, *coping* will be defined as an individual's attempts to utilize personal and social strategies to manage stress reactions and to take specific actions to modify the problematic aspects of the environment.

The literature on coping agrees that there are at least two foundational coping strategies, *problem-focused coping* and *emotion-focused coping* (Felsten, 1998; Matud, 2004). Billings and Moos (1981) and Seiffge-Krenke (2006) identified a third coping strategy: *cognitive focused coping*. Problem-focused coping involves attempts to directly modify or eliminate the situation (e.g., seeking support from others or planning a way to resolve the situation). Emotion-focused coping includes attempts to regulate or decrease emotional distress. Some examples consist of blaming others, venting emotions, avoidance, or self-blame (Felsten, 1998; Matud, 2004). Cognitive-focused coping is characterized by a conscious reflection about the problem and how to resolve it (Seiffge-Krenke, 2006). This type of coping may include modifying the meaning of problems, modifying situations, and managing symptoms of stress (Moos, 1993b; Diemer, 1997). According to Matud (2004), emotion-focused coping is not an effective

way of approaching a situation and it is more likely to be associated with psychological distress. In contrast, problem-focused coping and seeking social support have been associated with positive outcomes (Felsten, 1998; Matud, 2004).

The concept of coping is fundamental to the present study. As previously indicated, this study aims to measure new fathers' ability to cope with their partners' symptoms of PPD and determine their coping style. Moos' (1993b) theoretical coping framework was utilized to help identify fathers' coping styles. According to Moos, an individual takes a cognitive or behavioral orientation when addressing a stressor or problem, which then facilitates the way the person responds to the stressor or problem by either approaching it (problem-focused) or avoiding it (emotional/cognitively-focused).

Billings and Moos (1981) coined the terms *avoidance* and *approach* coping. Felsten (1998) also discussed avoidance and seeking social support as other coping strategies. Felsten explained that avoidance coping entails denial, distractions, behavioral disagreement, as well as substance use, while seeking social support or approach coping consists of seeking instrumental help or emotional support. An *avoidance coping response* reflects cognitive and behavioral attempts to avoid thinking about the stressor and its implications, or

avoid managing the affect associated with the stressor. In contrast, an *approach coping response* is identified by taking cognitive and behavioral efforts to master or resolve the stressor.

### **Coping with Partner's Postpartum Depression**

In assessing couples during the postnatal period, some studies have shown that not all men are impacted by their partners' PPD. Soliday, McCluskey-Fawcett, and O'Brien (1999) conducted a study on postpartum affect and depressive symptoms in mothers and fathers. The authors examined 51 couples, 26 of which were first-time parents and 25 of which were expecting their second child. Mothers and fathers were asked to complete questionnaires on coping, marital satisfaction, stress, positive and negative affect, and depression 1 month pre- and postpartum. The study revealed that in nearly half the couples, at least one parent reported depressive symptoms, and in 20% both experienced elevated symptoms. Buist et al. (2002) described a study conducted by Raskin, Richman, and Gaines that presented similar results as the aforementioned study. Raskin et al. examined 86 married couples pre- and postpartum and found that 59.3% had one depressed person in the couple and in 11.1% of couples both experienced depressive symptoms. Following this line of thought, one might wonder why some partners are more susceptible to experience depressive symptoms or

psychological disturbances when living with a partner suffering from symptoms of PPD, while others that find themselves in the same predicament do not.

In attempting to explore protective factors that may facilitate partners' ability to cope with their significant others' PPD, research has consistently found a partner's psychological support to be a strong component (Kim & Swain, 2007; Page & Wilhelm, 2007; Paulson & Bazemore, 2010). Letourneau et al. (2011) conducted a pilot study that included the participation of 11 fathers. The study aimed at understanding experiences, support needs, resources, and barriers to support for fathers whose partners had experienced PPD. Some fathers reported that escaping to work helped them cope with their partners' PPD, and others felt that work prevented them from becoming depressed. Other behaviors that facilitated their coping included: staying active, exercising, leaving the house, and avoiding or isolating themselves from certain social events. In particular, one father spoke about "getting out and going for a run" and needing to "just get out and separate myself" (p. 44). Socializing with friends to share feelings and experiences during this period was expressed in both Letourneau et al.'s and Deave and Johnson's (2008) study. Hammer and Good (2010) further noted that resilient individuals are more likely to experience positive emotions, which results in their ability to buffer stress and depression.



### **Gender, Gender Roles, Coping, and Depression**

Research has found differences in men's and women's coping styles; men frequently engage in instrumental coping styles and women tend to use emotion-focused coping (Matud, 2004). According to Matud (2004), several authors have suggested that traditional socialization patterns impact the way in which men and women cope with stress. In Western European countries, men are typically discouraged from showing feelings of grief, tearfulness, or sadness, or reaching out for support when interpersonal relationships hinder such experiences (Cochran & Rabinowitz, 2003). Traditional male roles suggest characteristics such as autonomy, self-confidence, assertiveness, being goal-oriented, and using more instrumental coping behaviors (Felsten, 1998; Matud, 2004). In addition, Premberg and Lundgren (2006) maintain that in many Western societies, men have assumed the role of the breadwinner. In contrast, traditional female gender roles embrace dependence, emotional expressiveness, and affiliation, lack of assertiveness, ensuring that others' needs are met, and more passive and emotion-focused behaviors, as well as seeking more social support (Bem, 1974; Felsten, 1998, Matud, 2004).

Moreover, masculine-specific roles are consistent with the tendency for men to use externalizing defenses that sway them to engage in ruminative

responses that may lead them to alcohol and drug abuse (Addis, 2008; American Psychological Association, 2005; Cochran & Rabinowitz, 2003) and to express irritation, anger and withdrawal. Other typically masculine behaviors consist of hostility, poor work performance, and cynicism (Spector, 2006). As it pertains to coping with depression, these types of attributes can mask signs of depression, which can make it difficult to detect and treat effectively (American Psychological Association, 2005).

Men can also be distinguished by the roles they adopt in their interpersonal relationships. These can be characterized by societal expectations or cultural influences. Kane (2000) noted that African-Americans have been found to engage in more egalitarian gender roles than whites. Kane further stated that Hispanic Americans have traditionally assumed a more patriarchal structure. Zheng and Zheng (2011) state that concepts of masculinity and femininity are influenced by culture and have also evolved in the process of socialization. In recent generations, according to Cabrera, Tamis-LeMonda, Bradley, Hofferth, and Lamb (2000), some men have adopted a more egalitarian gender role specific to work, home and family responsibilities, as fathers are now more active participants in their families and with their children.

The aforementioned gender role stereotypes and expectations may have profound effects on the way men respond to their partners' struggle with PPD. Davey et al.'s (2006) study elucidates overt experiences of men whose wives suffered from PPD, focusing on postnatal depression from the perspective of men. The men in the study were partners of women who had been diagnosed with PPD in the first 12 months post-delivery. The authors gathered data from two focus groups that were conducted after the conclusion of treatment interventions. Men's participation in treatment consisted of 2-hour weekly sessions over 6 consecutive weeks. Some men in the study reportedly struggled between the views, beliefs, and rules by which their fathers and grandfathers lived to the ones they attempted to integrate in their relationship. Some participants felt that their partners seemingly dismissed their attempts in trying to implement roles different from those of their predecessors. One father in the group alluded to the notion that women feel it is important for men to be the breadwinner and that "now it's more expected" (p. 213). He further explained that this expected role created frustration in his relationship, as he was responsible for working but for tasks at home and felt as though if he did not comply with both roles, his wife would resent him. Similarly, Buist et al. (2002) found that gender role stressors were

associated with distress pre- and postpartum and that distressed men were more likely to be anxious about their roles.

Furthermore, men in Meghan et al.'s (1999) study expressed coping with their spouses' PPD by sacrificing their own feelings. Meghan et al.'s study is noteworthy in that it was one of the first studies to focus on a deep understanding of PPD and its impact on the family through the experiences of fathers whose spouses suffered from the disorder. The study revealed fathers' traditional gender views on what their role of a man should be in a family. For instance, some of the men in this study reportedly suffered in silence and hoped for the best by holding themselves together in order to provide support to their spouse.

Barnes (2006) noted that men who care for a spouse who has been diagnosed with PPD often disclosed suffering from depression themselves. In her study, Barnes discussed how myths about parenthood may impact men's perceptions about their role as a father, as well as their partners and their new roles as mothers. Barnes referred to myths of: "mothers are the nurturers and that fathers are providers," or "babies are a women's work" (p. 30). Barnes also discussed that for males, work-related roles generally take precedence over family roles. Moreover, new mothers, even those who are not suffering from depression, often assume that their partners will automatically move family roles to the top of

their priority list. Therefore, the couple's perceptions about the transition to parenthood and parenthood roles create conflict in their relationship.

In summation, what has research shown about men's and women's coping mechanisms? Existing literature and studies consisting of coping styles have found that women tend to rely more on approach coping compared to men, who engage more in avoidance coping (Moos, 2004). According to Felsten (1998), a number of studies have consistently found that women are more likely than men to seek social support and engage in emotion-focused coping, which includes self-blame and expression of emotions. Similarly, Moos (2004), found that women engage in more social support seeking than men. Matud's (2004) study found that women scored higher than men on emotional coping style while men scored lower in rational and avoidance styles of coping.

Felsten's (1998) study evaluated gender differences in coping styles and associations between stress, coping, and depression by exploring three coping strategies: problem-solving, seeking social support, and avoidance. The author found that women engaged in more social support seeking behaviors than men, seeking support moderated the relationship between stress and depression in both men and women, and that men and women did not differ in problem solving. Further, problem solving was minimally associated with depression in men and

women. However, avoidance coping was associated with depression in men and women.

### **Relationship Satisfaction**

According to Spector (2006), the added stress of expanding a family impacts the family unit immediately. Likewise, psychological, psychosocial, and emotional vulnerabilities in individuals and couples may generate profound changes in romantic relationships postnatally. These shifts within the system may create difficulties for the couple, as lifestyle changes that accompany the arrival of a new infant require time for adjustment (Misri et al., 2000). The transition to parenthood itself has been reported to decrease a couple's level of marital satisfaction (Page & Wilhelm, 2007) and may be exacerbated if one partner suffers from PPD. According to Meghan et al. (1999), couples experience more problems when a male partner is taxed by his spouse's PPD.

Research has consistently demonstrated that a depressed female spouse could cause detrimental impact to the non-depressed partner (Buist et al., 2002; Matthey, Barnett, Ungerer, & Waters, 2000). As a result, interactions between them may become negative and complex, which can decrease the non-depressed spouse's cognitive and problem-solving abilities (Meghan et al., 1999). Barnes (2006) noted that traditional attitudes on sex roles tend to predict level of marital

satisfaction after the birth of a child, which can increase risk for maternal depression. Marital difficulties have also shown to have negative physical and psychological effects on spouses and are the most common reason people seek therapy (Vaughn & Matyastik-Baier, 1999).

Several authors have found a correlation between relationship satisfaction and maternal depression. Page and Wilhelm (2007) found that postpartum depressive symptoms were associated with poor marital satisfaction and that chronic depression can sometimes lead to divorce. Conversely, increased reports of marital satisfaction are correlated with fewer symptoms of depression. Misri et al. (2000) found that poor marital satisfaction is the most consistent psychosocial predictor of PPD. Likewise, Davey et al. (2006) found that PPD consistently appears to be associated with marital or relationship conflict or dissatisfaction. Furthermore, a meta-analysis of 43 studies by Paulson and Bazemore (2010) also found significant correlations between marital satisfaction and maternal depression.

Other factors found to influence level of relationship satisfaction include level of stress and social support. In most studies focusing on PPD, authors have alluded to the importance of support from the family or the non-depressed partner. A common theme in the literature indicated that high social support during

pregnancy leads to a healthier relationship and higher relationship satisfaction, and conversely that lower levels of support are linked to poor relationship satisfaction in women (Hung, 2004; Misri et al., 2000; Page & Wilhelm, 2007). Page and Wilhelm (2007) indicated that in some cases, higher levels of support could potentially decrease or prevent PPD. Purdom et al. (2006) assessed how spousal support differentially impacted dual and single-income couples' marital satisfaction. Their findings point to a strong association between spousal support and relationship satisfaction; as spousal support increased, marital satisfaction also increased. Furthermore, Barnes (2006) found that men who were more satisfied in their marriage (as opposed to those who were less satisfied) provided higher levels of support to their wives.

Another factor found to cause lower levels of relationship satisfaction is stress during pre-and postpartum period. Buist et al. (2002) found that men with lower levels of relationship satisfaction reported feelings of distressed than men with higher levels of relationship satisfaction. Markedly, relationship quality deteriorated between the pre- and postpartum period among those with low relationship satisfaction.

Lazarus and Folkman's (as cited in Diemer, 1997) stress and coping framework indicated that low levels of pregnancy-related stress and high levels of



coping are associated with more relationship satisfaction. Misri et al. (2000) stressed that a stable relationship helps partners adapt to the demands that are secondary to marriage, newborns, and family. Thus, the quality of a relationship in a couple is significant as it can help them navigate changes more smoothly and with less stress. Likewise, couples that have similar ways of coping with problems are more likely to report relationship satisfaction (Vaughn & Matyastik-Baier, 1999).

### **Empathy**

Beyond a couple's relationship satisfaction or gender roles, a father's capacity for empathy may influence his sensitivity and response to a partner's PPD. Empathy is defined as a person's ability to understand and share in the emotions of others that can be expressed both cognitively and emotionally (Klein & Hodges, 2001; Peloquin & LaFontaine, 2010). Peloquin and LaFontaine (2010) noted that research in the field of marriage and couples has shifted in terms of understanding the cause of distress in intimate relationship. Recently, researchers have focused on studying more positive processes, promoting the development of stable relationships rather than focusing on negative behavioral processes and emotions.

Peloquin and LaFontaine (2010) emphasize the importance of empathy, especially in a romantic relationship. Empathy may facilitate understanding between partners; their attunement to each other's feelings helps them feel understood and validated in their relationship. In the framework of a romantic relationship, partners rely heavily on each other for mutual support, compassion, and validation. Consequently, lack of empathy may lead a partner to feel misunderstood, unimportant, or dismissed. Thus, over time, the perception of feeling misunderstood may weaken a couple's relationship.

Peloquin and LaFontaine's (2010) perspective on empathy highly correlates with a study conducted by Morgan, Matthey, Barnett, and Richardson (1997). The authors conducted an 8-week support group for postnatally distressed women and their partners. Many of the fathers in the study appeared to experience difficulty understanding their partners' experience with PPD. The fathers provided instrumental support as well as emotional support. They either tried to "fix" (p. 914) the problem or attempted to empathize by providing emotional understanding. In either case, fathers experienced feelings of helplessness. Their lack of understanding about PPD led them to engage in argumentative dialogue. This study appears to capture the difficulties fathers experience in their efforts to provide support to their depressed partners by engaging in either instrumental

coping styles or emotional coping styles. Fathers may be empathic, but the notion of not understanding PPD creates more difficulty in their efforts to provide support. Indeed, many fathers acknowledge difficulty in understating their partners' PPD (Everingham, Heading, & Connor, 2006).

Further research along the lines of empathy notes that "a woman's perception of her partner's support helps increase her sense of well-being as a woman, wife and mother" (Misri et al., 2000, p. 557). Similarly, Barnes (2006) indicated that a man's appreciation of his partner appeared to act as a protective factor against PPD. As described by Peloquin and Lafontaine (2010), empathy may serve to maintain close bonds and enhance intimate connections. Meghan et al.'s (1999) study found that deep empathy and concern for their spouses suffering with postpartum depression were determined to be common characteristics among most participants. Moreover, Vaughn and Matyastik-Baier (1999) stated that increased partners' positive regard for each other predicts more relationship satisfaction. These findings clearly depict the significant impact that empathy can have on a romantic relationship. In fact, according to Diemer (1997), empathy promotes physical and emotional health in men and helps preserve a healthy relationship with their spouses.

### **Living with a Partner Suffering from Postpartum Depression**

Few studies have focused on men's experience with their partners' PPD. An early phenomenological study conducted by Meghan et al. (1999) explored the understanding of PPD and its impact on the family through the experiences of 8 fathers whose spouses suffered from the disorder. The authors began the study following the delivery of the couple's baby and the onset of men's partners' depression. The study revealed a disruption in their lives and in their relationships with their partners. Men reported experiencing fear, confusion, and concern for their spouses; they felt unable to help in their recovery from PPD. Some men expressed frustration for their inability to "fix the problem" (p. 205) and also described a feeling of helplessness. All of the men reported stress from increased demands and fatigue, and many of the participants described feelings of anger and resentment (Meghan et al., 1999). In 2006, another study compared the psychological health of men with partners who had PPD with that of men with partners without PPD. The authors found that men whose partners were suffering from PPD had more symptoms of depression, aggression and non-specific psychological impairment, higher rates of depressive disorder, and problems with fatigue (Roberts, Bushnell, Colling, & Purdie, 2006). Furthermore, Davey et al. (2006) found that clinical reports indicate that men experience a number of

distressing effects when their women have been diagnosed with PPD. These include, depression, stress, and loss of intimacy in their relationship, as well as feeling excluded from their infant, confused and fearful their partner will not recover.

These findings are further supported by a recent study conducted by Letourneau et al. (2011). The researchers conducted a pilot study to describe the experiences, support needs, resources and barriers to support fathers whose partners had experienced PPD. They interviewed 11 fathers and found that fathers experienced anxiety, lack of time and energy, irritability, feeling sadness, changes in appetite, and even thoughts of self-harm or harming the baby.

A number of themes can be extrapolated from the research findings and studies regarding father's experiences when living with a partner suffering from PPD. These new fathers consistently report symptoms of depression, fear, helplessness, anger and irritability, and stress. An increased concern regarding men's experiences is highly relevant in the medical and mental health field, as it may help facilitate new fathers' experiences.

### **Postpartum Depression**

Thousands of births take place in the United States every day. A preliminary estimate of 3,999,386 births took place in the U.S. in 2010 (Martin et

al., 2012). Many families are either expecting their first child, adding a new member to their family, or adapting to news of an unexpected pregnancy. This transition can be disrupted by a devastating condition commonly diagnosed in women, PPD. Descriptions of depressive symptoms surrounding the prenatal and postnatal period date back to 1850s, with the publication of Louis Victor Marcé M.D.'s 1858 work on psychiatric disorders of women, during and following pregnancy (Trede et al. 2009). Marcé's work served as "one of the first reported descriptions and validations of negative emotional reactions for mothers giving birth to a child" (Allen, 2010, p. 4). In his observations, Marcé (as cited in Trede et al., 2009) acknowledged differences in psychiatric mental illnesses, especially those associated with pregnancy. His work was ignored for 150 years. However, his efforts served as a foundation to explore the high risk of depression in pregnancy (Trede et al., 2009). Moreover, awareness in the area of PPD became more prominent in the 1950s after the revolutionary work of Gordon and Gordon (as cited in Everingham et al., 2006). Their work set the foundation for developing the current diagnostic criteria for PPD. Since then, research has been conducted to enhance clinicians' knowledge and understanding of PPD (Everingham et al., 2006).

The severity of a woman's postpartum depressive symptoms can best be described on a continuum. There is a temporary period that many women experience shortly after birth known as the *baby blues*. This period is characterized by weepiness, depressed mood, irritability, anxiety, hypochondriasis, and sleeplessness experienced during the first 10 days following delivery (Harris, 2002). According to Greenberg et al. (as cited in Page & Wilhelm, 2007), about 80% of new mothers experience baby blues, which is believed to result from the hormonal changes a woman undergoes following birth. If the aforementioned symptoms do not disappear within the 10-day time frame, it may be a sign of emerging PPD. According to Boath and Cox (1998), PPD may last up to 6 years, either continuously or intermittently.

A much smaller percentage of mothers may experience more severe symptoms of *postpartum psychosis*, which include hallucinations, paranoia, and delusional, suicidal, or homicidal thoughts (Greenberg et al., 2001). Such reactions are considered to be the most serious form of psychological reaction after the birth of a child (Glavin, 2012). Discrepancies were noted in the prevalence rate of postpartum psychosis; whereas Greenberg et al. (2001) stated that 1 in 1,000 new mothers develop this condition, Misri et al. (2000) noted that 2 in 1,000 mothers develop this disorder. However, the percentage of women who

experience postpartum psychosis is far smaller than the percentage of women who experience baby blues or PPD.

Minor discrepancies exist among the reported prevalence rates of PPD. According to Edhnborg (2008), PPD in mothers has a reported prevalence of about 13%. However, Paulson et al. (2006) indicated the prevalence rate to be 14%. A possible explanation for the discrepancy is that prevalence rates are impacted by cross-cultural variables such as frequency of reporting, mental health stigmas, socioeconomic status, as well as biological vulnerabilities (Barnes, 2006). Moreover, PPD symptoms typically appear in the first 6 weeks following birth, and in 60% of cases, they represent a woman's first depressive episode (Misri et al., 2000).

A number of studies have found that PPD has adverse effects on family, personal, and parent-child interactions (Kim & Swain, 2007; Paulson & Bazemore, 2010; Soliday et al., 1999). PPD symptoms can impair close relationships and negatively affect children's development (Moran & O'Hara, 2006). Additionally, a variety of factors can exacerbate PPD symptoms, including low self-esteem, inability to cope, feelings of incompetence, as well as loneliness (Letourneau et al., 2011).



### **Postpartum Depression and DSM-IV-TR**

PPD can manifest in a variety of ways. To ensure that mothers meet the criteria for PPD, the diagnostic criteria in the DSM-IV-TR (American Psychiatric Association, 2000) are utilized to characterize the disorder and distinguish it from adjustment to a life transition that falls within normal limits. However, the DSM-IV-TR does not recognize PPD as a separate diagnosis. Therefore, the diagnostic criteria used to assess for PPD are that of a Major Depressive Episode with the onset occurring 4 weeks after birth. Depressive episodes are characterized by loss of interest and enjoyment in pleasurable activities, and any of the following: depressed mood most of the day, loss of interest in virtually all activities, significant weight loss or gain, psychomotor agitation or retardation, fatigue or loss of energy, feelings of worthlessness or inappropriate guilt, diminished concentration or indecisiveness, or recurrent thoughts of death, suicidal ideations (American Psychiatric Association, 2000). Other symptoms of PPD not detailed in the DSM-IV-TR but noted by researchers may include feeling anger towards a partner, disappointment, decreased libido, a loss of desire for physical contact with the partner, obsessive thoughts and compulsions, fear for the infant, or fear of being alone (Davey et al., 2006). Severe symptoms such as intrusive thoughts of hurting the baby have also been reported (Misri et al., 2000).

### **Postpartum Depression and Other Disorders**

The typology of the stressors in PPD warrants differentiation from other, more general diagnoses, such as adjustment disorders. There are some striking similarities between these two syndromes. Therefore, why not characterize PPD as symptoms of an adjustment? It is indeed true that new parents are adjusting to environmental and situational events that are causing distress and impairing their social and perhaps occupational functioning.

Nonetheless, to this evaluator, the symptoms these individuals experience during the postpartum period are more prominent than those of an adjustment disorder. For instance, in an adjustment disorder, a person is trying to adapt to a change, such as a new job or a move. These changes, according to the Diagnostic and Statistical Manual (DSM-IV-TR; American Psychiatric Association, 2000), occur within 3 months of the onset of the stressor(s) and do not persist for more than 6 months. In PPD, however, the onset of the episode is nearly immediate: within 4 weeks postpartum (American Psychiatric Association, 2000). It is understandable that the onset of an adjustment disorder can also be immediate, but the duration of the symptoms is shorter in comparison to that of PPD. According to Boath and Cox (1998), PPD may last up to 6 years, either continuously or intermittently.

In PPD, a parent is trying to adjust to multiple daily stressors and multiple roles (parent, spouse, friend, sibling, daughter/son, and worker) as the transition to parenthood shifts many relationships (Kim & Swain, 2007). These upheavals within the family and environment can also potentially affect the adaptability of the parent dealing with PPD, as well as a parent that has to adjust to the emotional and psychological changes of his spouse that is suffering from PPD.

As previously indicated, individuals with an adjustment disorder have a specific timeframe as opposed to those with PPD. Those that exceed the timeframe have to be reassessed and given a different diagnosis that follows another set of criteria, which will also have to be treated differently. In all, the nature of the stressors are taken into account and characterized differently, which forms a unique diagnosis.

### **Paternal Postpartum Depression**

Pringle coined the term Paternal Postpartum Depression (PPND) in 2009. According to Daniels (2011), a meta-analysis in the *Journal of the American Medical Association* brought light to the disease. Although the concept of PPND is not central to this study, it is important to highlight research in this area to increase the reader's awareness about this phenomenon. Kim and Swain (2007) noted that in the early postpartum period fathers must adjust to an array of new

demanding roles and tasks. As a result, these changes and adjustments may cause them to experience depressive symptoms. Unfortunately, the emotional life and experience of fathers after the birth of an infant has often been overlooked, leaving PPND relatively unrecognized (Goodman, 2004) and controversial (Anthes, 2010).

Several studies have investigated the prevalence rate of PPND. Matthey et al. (2000) found that between 4.8% and 13% of fathers experience depressive symptoms during the postpartum period. USA Today (2002) conducted a study on postpartum depression in men and found that 10% of fathers among the 5,000 participating couples who had recently had a baby experienced significant levels of depression after the birth of a child. In contrast, Goodman (2004) found a wide range of prevalence of PPND, 1.2 to 25.5%, in a meta-analytic review. In recent years, Paulson and Bazemore (2010), who also conducted a meta-analysis of 43 studies, estimated the rate of PPND to be 10.4%, with the highest rate occurring between 3-6 months. Kim and Swain (2007) hypothesize that the wide range of reported PPND prevalence is likely due to the use of different measures, cut-off scores, and the timing at which the assessments are given during the postpartum period.

According to Matthey et al. (2000), fathers whose partners have been diagnosed with PPD are 2.5 times more at risk to be depressed compared to fathers whose partners are not depressed. Bielawska-Batorowicz and Kossakowska-Petrycka (2006) found that mothers' and fathers' scores on the Edinburg Postnatal Depression Scale (EPDS) were related. That is, men whose partners' scores on or above the cutoff score (13) also received scores above the cutoff. Their results also indicated that depressed fathers scored lower on relationship satisfaction and social support and reported higher financial strains. All the studies in Goodman's (2004) review assessed for paternal depression and found depression in one partner to be strongly correlated with depression in the other. A handful of studies found that fathers were more likely to be depressed if their spouse experienced PPD.

Although research has repeatedly found that men's depression is related to their partners' depression, a partner's PPD is not the only factor contributing to depression in fathers. Social, familial, and economic factors, as well as environmental circumstances, have been found to impact fathers' mental health during this period. For instance, in a study conducted by Letourneau et al. (2011), fathers discussed issues that compounded their experience of depression, such as: infant health issues, interference by extended family, recent moves, and

employment and financial stressors. Bielawska-Batorowicz and Kossakowska-Petrycka (2006) conducted a study that focused on depressed mood in men after the birth of a child. Their sample consisted of 80 couples that were asked to complete a set of questionnaires including the Edinburgh Postnatal Depression Scale (EPSDS). Elevated scores on the EPSDS were found among fathers who reported having financial troubles. The authors also found that depressed fathers, as opposed to their non-depressed counterparts, were younger and less satisfied with their level of social support.

Furthermore, Soliday et al. (1999) found that affect, both positive and negative, may be related to depressive symptoms. They asserted that positive affect (energy, enthusiasm, and engagement) has been associated with greater quality and quantity of social interactions. In contrast, negative affect (general distress, anger, contempt, guilt, and nervousness) has been related to self-reported stress, unpleasant engagement, and health complaints.

Additionally, PPD typically manifests later in men than in women (Kim & Swain, 2007). Paulson and Bazemore's (2010) findings indicated an elevated rate of depressive symptoms in fathers between 3 to 6 months postpartum as opposed to their partners whose symptoms most often manifested soon after the birth of their offspring. A study conducted by Areias et al. (as cited in Goodman, 2004)

found that out of the 43 new fathers in their study, 4.8% were depressed during the first 3 months, whereas 28.6% were depressed during the first year. Furthermore, Matthey et al. (2000) found that fathers' depression was consistently lower than mothers at 6 weeks, 4 months, and 12 months, and that their depression only reached statistical significance after the first year. However, these low prevalence rates might have been due to the low rates of depression experienced by both mother and father at 6 weeks and 4 months.

### **Diagnostic Characteristics**

According to Kim and Swain (2007), "remarkably, there is not yet one single official set of diagnostic criteria for paternal postpartum depression" (p. 38). Therefore, the diagnostic criteria currently used to identify PPD in men are those of Major Depressive Disorder with postpartum onset, which is the same set of criteria used with women. The authors further argued that the diagnostic criteria should be distinctive for men, since studies have shown that PPND has a later onset and manifests differently. As indicated by Wang (2010), depressed men are likely to exhibit more aggressive behaviors and hostility, whereas women tend to become sad. Researchers have also indicated that men may exhibit depressive symptoms by abusing substances, such as drugs or alcohol (Addis, 2008; American Psychological Association, 2005), overwork (Condon, Boyce, &

Corkindale, 2003), and engage in risk-taking behaviors (McCoy, 2012), or express irritation and anger (Cochran & Rabinowitz (2003). Other behaviors include hostility, poor work performance, and cynicism (Spector, 2006). Men may also be considered less expressive than women, rendering them harder to diagnose (Kim & Swain, 2007) and treat effectively (American Psychological Association, 2005). Kim and Swain's (2007) findings correlated with those of Goodman (2004), who also noted a later onset of depressive symptoms in fathers during the postpartum period.

Furthermore, the literature also notes that fathers experience higher levels of anxiety during the postnatal period, which may result in the underreporting of depressive symptoms (Goodman, 2004). Matthey et al. (2000) explained that the lower levels of depressive symptoms reported by fathers in their study might have been a result of gender difference theories, which include: symptom differences experienced by men and women, inability to remember symptoms, or experiencing different symptoms than those assessed on diagnostic interviews or self-report questionnaires. Matthey and colleagues suggested that it might be more effective to assess for anxiety, stress, as well as depressive symptoms to obtain a better understanding of fathers' difficulties during this period. A study



by Matthey, Barnett, Howie, and Kavanagh (2003) found that fathers were highly prone to develop depressive symptoms when experiencing anxiety.

As described by Madsen and Burges (2010), research on PPD in women has evolved over an extended period of time, which has assisted in the establishment of diagnostic criteria, definitions, screening tools, etc. As it stands, there are no paternal postpartum depression diagnostic criteria characterizing symptoms in men (Kim & Swain, 2007) and even though screening tools used to assess depressive symptoms in women have been validated for use with men (Matthey, Barnett, Howie, & Kavanagh, 2001), no single rating scale exists specific to men.

### **Screening for Depression**

The Edinburgh Postnatal Depression Scale (EPDS) is a tool most commonly used to assess for postpartum depressive symptoms in women. It has been shown to be effective in increasing early diagnosis of PPD (Miller, 2002). The EPDS consists of 10 self-report items; 8 out of the 10 items assess for depressive symptoms while the remaining items assesses for symptoms of anxiety. Responses are scored from 0-3 according to the reported severity of symptoms. A score of 13 or higher is considered to be clinically significant and may indicate that the individual is suffering from PPD. The maximum score is 30,

indicating high levels of depressive symptoms. Individuals rate their emotional state according to how they have been feeling in the past week. The timeframe in which the EPDS is given is typically 6-12 weeks after birth. However, it can be given up to 12 months after birth (Kim & Swain, 2007; McCoy, 2012).

Unfortunately, no valid screening tool has been found to accurately identify depression in fathers during the postpartum period (Moran & O'Hara, 2006). Nonetheless, Edmondson, Psychogiou, Vlachos, Netsi, and Ramchandani (2010) found EPDS to be effective and valuable to administer to new fathers in order to assess depression in fathers during the postnatal period. Other researchers have acknowledged the utility of this tool for assessing PPD symptoms in men, including Kim and Swain (2007), Matthey et al. (2000, 2003), and McCoy (2012). Of the various instruments used to assess for depression during the postpartum period, the EPDS has been found to specifically assess for depression during this period (Goodman, 2004).

Edhnborg (2008) suggests that even though fathers are less likely to be depressed than new mothers and often start feeling depressed later than women during the first year, it is important for health care professionals to be aware of fathers' experiences. According to Cochran and Rabinowitz (2003), men's

depression may manifest through substance abuse, irritability, and anger. As a result, their depression often goes unidentified, undiagnosed, and untreated.

### **Risks of Postpartum Depression**

A range of variables can trigger or intensify a mother's PPD. Research has found the following risk factors to be linked to mothers' PPD: previous history of depression (Glavin, 2012), marital dissatisfaction or conflict, unemployment (Davey et al., 2006), unplanned pregnancies (Kara, Unalan, Cifcili, Cabeci & Sarper, 2008), inadequate social support (Miller, 2002; Page & Wilhelm, 2007), negative life events in the period leading to the birth (Boyce & Hickey, 2005), and psychosocial stressors (Page & Wilhelm, 2007). Harris (2002) found age to be a risk factor in both younger and older women. He further stated that high levels of neuroticism placed women at higher risk of experiencing PPD. Page and Wilhelm (2007) noted that risk factors such as, women's level of relationship support, coping abilities, stress responses, and anxiety were open to changes.

Likewise, certain risk factors have been linked to PPND, such as maternal PPD, past history of severe depression, depression or anxiety during the prenatal period, low levels of education (McCoy, 2012), financial stressors (Bielawska-Batorowicz & Kossakowska-Petrycka, 2006), and substance abuse and dependence (Madsen & Burges, 2010). Condon et al. (2003) pointed out the

following gender-specific risk factors: sparse support networks, responsibility for providing material support as well as additional finances, lack of good role models, and men's reluctance to seek emotional support. Furthermore, Kim and Swain (2007) identified the risk factors of, psychological problems, biological (hormonal changes), and ecological factors (family, community, work, society, and culture).

Bielawska-Batorowicz and Kossakowska-Petrycka (2006) found similar risk factors associated with postpartum mood disorders in mothers and fathers, such as level of social support, personality style, level of marital satisfaction, and prenatal expectations. Furthermore, parenting stress was found to be a risk factor for both men and women (Soliday et al., 1999).

### **Summary of Reviewed Literature**

This review of relevant literature began with a discussion of coping and coping styles, including behavioral and cognitive domains, as well as avoidance and approach coping strategies (Billings & Moos, 1981). An exploration of coping with a partner's PPD was followed by a discussion of gender's role in coping and depression. Relationship satisfaction and empathy literature was reviewed, as well as the impact of living with a partner suffering from PPD.

PPND literature was reviewed, including protective factors, diagnostic criteria, and screening for depression.

While this literature was informative regarding coping, empathy, gender roles, and relationship satisfaction, no studies to date have utilized a quantitative case study approach to determine whether fathers cope differently with their partners' PPD in the context of empathy, perceived gender roles, and relationship satisfaction. The following chapter details the methodology used to fill this void in the current study.

### **CHAPTER III: Methodology**

This chapter outlines the methodology of the present study. It will discuss the motive behind the research study, the underlying philosophies and components of the research design; articulate the strengths and limitations of this method; and address the formulated research questions and hypotheses. Additionally, it will describe the recruitment process; provide a description of the instruments, potential risks and benefits for participants, potential challenges, and ethical assurances; and conclude with data analysis.

Research has shown a scarcity of research in the field of postnatal experiences in men: in particular, fathers' coping styles when living with a partner experiencing symptoms of PPD. Lack of research on this topic along with the investigator's work with clients suffering from symptoms of PPD provided the foundation for this study. Moreover, the lack of support in the medical and mental health fields for men during the postpartum period led to the researcher's interest in creating awareness about their experiences in the context of living with a depressed partner.

Some of the literature alludes to the lack of support for fathers in the health care system, while other literature (Kim and Swain, 2007) indicates that PPD in fathers and their postnatal experiences are beginning to gain recognition.

Existing studies have investigated fathers' experiences when living with a partner with PPD but have not addressed differences in their coping styles. Additionally, studies have not investigated the impact of fathers' level of relationship satisfaction, empathy, and views on gender roles on their coping styles.

The significance of this line of investigation may potentially prompt medical and mental health professionals to include, assess, or encourage fathers' participation in the services provided to their partner, to develop support groups, psychoeducational handouts, or resources specific to fathers' needs during the postnatal period. Most importantly, this research may prompt medical and mental health professionals to help fathers develop appropriate coping skills or engage in other therapeutic interventions to help fathers cope with their partners' symptoms of PPD.

### **Research Design and Philosophies**

A number of studies and some dissertations have investigated PPND. Some studies, such as those conducted by Letourneau et al. (2011) and Meghan et al. (1999) have specifically explored the experiences of men when living with a spouse suffering from PPD through the use of qualitative methods. Similar to Letourneau et al. and Meghan et al.'s research topics, this study aims to

investigate men's experiences when living with a spouse suffering from symptoms of PPD, but through the lens of a quantitative research approach.

According to Creswell (2009), quantitative research is “a means of testing theories by examining the relationship among variables” (p. 4). This research approach is an objective, formal, systematic process in which numerical data are used to measure phenomena and generate findings. It also tests and examines cause and effect relationships. Quantitative methodologies also test theory deductively from knowledge attainment; hypothesized relationship among variables are then developed and tested through the use of selected instruments (Carr, 1994). The main philosophical approach behind this research design is that it mirrors the natural sciences by adhering to a positivist worldview (Creswell, 2009; Svajl, 2012). The framework of positivism posits that each individual lives in the context of a worldview that influences how he/she thinks, interacts, and organizes his/her life. Therefore, an individual's worldview also influences the way he/she conducts research. To uncover individuals' worldview, their basic sets of beliefs need to be analyzed (Ryan, 2006). According to Creswell (2009) this process is labeled post-positivist, which represents thinking after positivism and challenges the idea of the truth of knowledge; it also recognizes that individuals



cannot be positive or certain about their knowledge, especially when studying behavior or actions in humans.

Svajl (2012) stated that empiricism and realism are two additional, closely related theories underlying quantitative research. Empiricism implies that knowledge is attained by individuals' senses and personal experiences. Moreover, the two epistemologies of positivism and empiricism are related to realist ontology, which posits the existence of a reality that is not merely dependent on opinion, and that reality has its own systematic set of rules that exist independently of external stimuli.

Another methodological component of quantitative research consists of variables. A variable is a characteristic of a person [or an animal, machine or phenomenon] that can be measured and that varies among individuals being studied. Such variables can be measured by using instruments and subsequently analyzed, which, in turn, determines a probable relationship or causation among variables (Creswell, 2009). Quantitative methods rely heavily on approaches such as arranging the phenomenon under investigation into a quantifiable form by dividing variables. For the purpose of this study, only two variables will be discussed: independent and dependent. The separation of these variables enables the researcher to use deductive reasoning and test hypotheses (Svajl, 2012).

### **Independent and Dependent Variables**

Independent variables cause, influence, or affect outcome. The independent variables in this study consist of relationship satisfaction, empathy, and gender role. Dependent variables depend on the independent variables. Independent variables influence the outcome of the dependent variable. In this study, there is only one dependent variable: coping. One of the intents of this study was to examine the relationship between the dependent variable and the aforementioned independent variables (Creswell, 2009).

In quantitative methods, variables are typically measured through using instruments that are then analyzed using statistical measures (Creswell, 2009). To successfully measure and analyze variables, a survey design was selected. This design provided a numeric description of trends, attitudes, or opinions of the sample of the population being studied. Four questionnaires were selected for this study. Questionnaires were chosen according to their validity and reliability, as well as those that correlated highly with the established variables. Of concern was the length of time to complete for each questionnaire. Therefore, preference was given to brief questionnaires. There was a strong inclination to offer this study to the Spanish-speaking population. However, this raised the question of translation,

which would have detracted from the questionnaires' validity and reliability. As a result, the researcher chose to include only English-speaking participants.

### **Strengths and Limitations**

Like other research methods, quantitative designs have strengths and limitations. A few strengths surrounding this method include the testing and validation of constructed theories, generalizing research findings based on random samples of sufficient size, and a high level of control over the experimental condition. Furthermore, quantitative methods can be relatively quick depending on the data collection process. Information gathered about the relationship between variables can assist in predicting and controlling future outcomes, and the researcher's detachment from subjects can guard against bias and ensure objectivity.

These strengths can also be viewed as limitations. For instance, one can generalize but not if the sample is too small. The researcher can also leave out features of the interpreting data. In addition, the overuse of questionnaire may also pose a disadvantage, according to Carr (1994). Moreover, that quantitative research may not be purely objective or free of bias, according to positivist (Carr, 1994; Svajl, 2002).

The selection of this research design stemmed from the writer's philosophical belief that one factor might influence another, which may, in turn, help determine outcome or effects, in this case, in individuals. As it pertains to the topic being investigated, a woman's symptoms of PPD may be associated with changes in the dynamics of her relationship, which can potentially create difficulties for her partner. The quantitative design selection was also influenced by current research, specifying that this approach is common when investigating correlations or outcomes in human behavior (Creswell, 2009). Yet another component was the practicality of using self-administered questionnaires to measure variables and test hypotheses.

### **Research Questions and Hypotheses**

The practical use of a quantitative research approach allows researchers to develop hypotheses through the use of the variables, which, in turn, help determine probable cause and effect or association between variables. Quantitative hypotheses are predictions the investigator makes about the anticipated relationship among the independent and dependent variable(s) (Creswell, 2009). The development of the hypotheses stemmed from the use of the instruments in the study and by the researcher's worldview about PPD and its

impact on the non-depressed spouse. The following research questions and hypotheses were investigated:

Research Question 1: Do men cope differently with their partners' postpartum depression?

*Null Hypothesis 1:* Fathers with partners suffering from postpartum depression are similar in coping methods (cognitive and behavioral) or approaches (avoidance and approach).

*Alternative hypothesis 1:* Fathers with partners suffering from postpartum depression are not similar in coping methods (cognitive and behavioral) or approaches (avoidance and approach).

Research Question 2: What is the level of relationship satisfaction in fathers when living with a partner suffering from postpartum depression and how does it relate to coping?

*Null Hypothesis 2:* Fathers with partners suffering from postpartum depression are similar in relationship satisfaction.

*Alternative Hypothesis 2:* Fathers with partners suffering from postpartum depression are not similar in relationship satisfaction.

*Null Hypothesis 2a:* Relationship satisfaction is not related to coping in fathers with partners suffering from postpartum depression.

*Alternative Hypothesis 2a:* Relationship satisfaction is related to coping in fathers with partners suffering from postpartum depression.

Research Question 3: Do fathers express empathy differently when living with a partner suffering from postpartum depression and how does it relate to coping?

*Null Hypothesis 3:* Fathers with partners suffering from postpartum depression are similar in empathy (perspective taking or empathy concern).

*Alternative Hypothesis 3:* Fathers with partners suffering from postpartum depression are not similar in empathy (perspective taking or empathy concern).

*Null Hypothesis 3a:* Empathy is not related to coping in fathers with partners suffering from postpartum depression.

*Alternative Hypothesis 3a:* Empathy is related to coping in fathers with partners suffering from postpartum depression.

Research Question 4: Do fathers differ in gender role views and how do they relate to coping?

*Null Hypothesis 4:* Fathers with partners suffering from postpartum depression are similar in gender role views.

*Alternative Hypothesis 4:* Fathers with partners suffering from postpartum depression are not similar in gender role views.

*Null Hypothesis 4a:* Gender roles are not related to coping in fathers with partners suffering from postpartum depression.

*Alternative Hypothesis 4a:* Gender roles are related to coping in fathers with partners suffering from postpartum depression.

### **Recruitment of Participants**

The inclusion criteria for the participants in this study were as follows: (a) must be 18 years of age or older, (b) must be able to read and understand English (c) must be the infant's biological father, and (d) partner or spouse must be suffering from symptoms of PPD. Since the researcher was interested in fathers' lived experiences in the context of their partners' PPD, it was assumed that being the biological father of the infant and most importantly living with their partner would best capture these fathers' experiences.

A recruitment letter (see Appendix B) along with a flyer including the content and purpose of the study was hand-delivered, faxed, or sent through electronic mail to OBGYNs' offices; pediatricians' offices; Public Health clinics (Santa Barbara County and Riverside County); non-profit organizations; community health clinics; community counseling centers; hospitals (Santa Barbara County, San Luis Obispo County, and San Bernardino County); PPD groups for mothers; Planned Parenthood Clinics in Ventura, Santa Barbara and San Luis Obispo counties; as well as private practice offices (Psychologists and Marriage and Family Therapists) in Santa Barbara, San Luis Obispo, Ventura, Riverside, and Los Angeles counties. These agencies and clinics were sought as a source for recruiting participants because they: (a) offered support to mothers suffering with symptoms of PPD, (b) screened mothers for PPD, and (c) could potentially connect the researcher to other agencies or clinics that offered services to mothers during the postnatal period. A telephone call followed with each location to ensure agencies and clinics received the flyer and letter.

The Marcé Society for Perinatal Mental Health was contacted to request the opportunity to post a description of the study on their website. This Marcé Society aims to communicate about research into all aspects of the mental health of women, their infants and partners around the time of childbirth, which served



as a primary reason to contact. The Postpartum Support International (PSI) was also contacted. PSI is dedicated to helping women suffering from mood or anxiety related disorders pre-or postpartum including postpartum depression. Some PSI members were contacted and dialogue was exchanged about the study. Members volunteered to distribute flyers to assist the researcher in this study. A description of the study was also posted on Craigslist in Santa Barbara and San Luis Obispo counties, and Central Coast Exchange in Santa Barbara County. Furthermore, The Nan Tolbert Nursing Center of Ventura County assisted by announcing the study in their August 2012 Newsletter. The center offers an array of services to parents and families during the pre- and postnatal period. Moreover, a presentation of the study took place on three separate occasions, one at the Santa Barbara County Children's Clinic and the others at a non-profit organization in Santa Barbara County, both of which provided services to mothers suffering from PPD.

Once an agency, organization, clinic, or individual expressed interest in the study, packets were hand-delivered. Each packet contained an informed consent (Appendix A) explaining: the procedures of the study, potential risks and benefits, their volunteered participation and right to withdraw from the study at any time, as well as the opportunity to be entered in a drawing, to win a Visa gift card, that took place at the end of the study. The packet also included a

demographic questionnaire (Appendix D), Interpersonal Reactivity Inventory (IRI; Appendix E), Sex Role Egalitarianism Scale (SRES), Relationship Assessment Scale (RAS; Appendix F), and the Coping Responses Inventory (CRI), as well as a self-addressed stamped envelope to return the completed packet. Follow-up telephone calls were made to organizations that expressed interest in participating.

### **Description of Instruments**

To determine common characteristics among the sample, a demographic information form was developed (see Appendix D). This form, the first in the packet, requested the first set of information from participants. It inquired about their age, racial identification, marital status, awareness of PPD, level of education, and employment status. The intention of this form was to provide a description of the sample and to address similarities and differences among participants.

A number of instruments were considered in this study. Weight was given to instruments that were brief. From fathers' perspectives, factors considered in the decision to include a particular instrument were their lack of energy due family obligations, social or occupational demands, and time constraints due to

the overwhelming demand experienced with the arrival of a newborn. To that end, the following instruments were selected:

**Relationship Assessment Scale.** Relationship satisfaction of participants was measured by using the *Relationship Assessment Scale* (RAS; Hendrick, Dicks, & Hendrick, 1998). The RAS was developed using a sample of dating university students. It consists of a seven-item Likert-scale measure of global relationship satisfaction. The instrument items are unique in that they are worded so that they are not specific to marriages and are general enough to apply to all types of romantic relationships (Graham, Diebels, & Barnow, 2011). The RAS shows moderate to high correlations with measures of marital satisfaction, good test-retest reliability and consistent measurement properties across samples of ethnically diverse and age-diverse couples (Hendrick et al., 1998). The RAS has a mean inter-item correlation is .49, and an alpha of .86. Vaughn and Matyastik-Baier (1999) noted that internal consistency of the current version is high, .86. In fact, the RAS has been highly correlated with the Dyadic Adjustment Scale (DAS). In their study, Vaughn and Matyastik-Baier found a correlation of .84 between the RAS and DAS, which they considered significant, suggesting that both instruments measure a similar aspect of relationship quality. Vaughan and

Matyastik-Baier did not find significant gender differences in their sample (118; see Appendix F).

**Interpersonal Reactivity Index.** Empathy in participants was measured using the *Interpersonal Reactivity Index* (IRI) by Dr. Mark Davis (1980). The IRI is a multidimensional scale designed to measure both cognitive and emotional components of empathy. This scale is composed of 28 self-report items, evaluated on a 5-point scale. The scale yields four subscales, each including seven items: *perspective taking* (IRIpt), *fantasy scale* (IRIfs), *empathic concern* (IRIec) and *personal distress* (IRIpd; Davis, 1980; Peloquin & Lafontaine, 2010). The subscale scores range from 0 to 28. The scales are divided to measure both cognitive and emotional constructs of empathy. *Fantasy* and *perspective taking* measure cognitive dimensions, whereas *emotional concern* and *personal distress* measure emotions (Davis, 1983). Davis (1980) showed that all four IRI subscales had good test-retest consistency (0.62 to 0.71) and internal consistency (alpha ranged between 0.71 and 0.77) over a 2-month retest period (Siu & Shek, 2005). Siu and Shek (2005) conducted a study to assess the validity of the IRI in a Chinese context and found the internal consistency for all subscales to be good, as reflected by a Cronbach's alpha of .65 to .70. The test-retest reliability in a 2-week period was between .68 and .83.

For the purpose of this study, the investigator used two subscales, *empathic concern* (IRIec) and *perspective taking* (IRIpt), which capture both cognitive and emotional dimensions of empathy. The IRIec measures sympathy and concern for others, which is the primary interest of this study. This scale, according to Davis (1980), can be viewed as measuring emotional empathy. The IRIec items are related to feelings of empathy towards others, such as “When I see someone being taken advantage of, I feel kind of protective towards them” (p. 1). This scale also measures other feelings of sympathy and concern for others in distress. In contrast, IRIpt measures the tendency to spontaneously take others’ psychological viewpoints. For instance, “when I am upset at someone, I usually try to ‘put myself in his shoes’ for a while” (p.1); see Appendix E).

**Sex-Role Egalitarianism Scale.** The degree to which traditional male ideologies present themselves was measured using the *Sex-Role Egalitarianism Scale* (SRES), Form BB. The SRES measures traditional and nontraditional male and female attitudes through the use of 25 self-reported items. Five 5-item domains of content are include Marital, Parental, Employment, Social-Interpersonal-Heterosexual, and Educational Roles. Each SRES item is accompanied by a 5-point Likert response scale, with options ranging from 1 (strongly disagree) to 5 (strongly agree). Computed scores range from 25-125; the

higher the summative score, the greater the endorsement of sex-role egalitarian attitudes. In contrast, the lower the summative score the greater the endorsement of traditional, pro-male, or non-egalitarian attitudes (King & King, 1993). The alpha coefficient is .94. The SRES has demonstrated a 3 week-test-retest stability of .88 and has been correlated with the SRES long forms (Walker, Tokar & Fischer, 2000). In a study conducted by King and King (1997), the internal consistency reliability for Form BB was .94.

**Coping Responses Inventory.** Coping abilities was measured using the *Coping Responses Inventory* (CRI) by Dr. Rudolf Moos (1993a). The CRI is a 48-item Likert-type instrument that assesses eight different styles of coping responses to stressful life events. The instrument uses the approach-avoidance framework and measures both cognitive and behavioral strategies of coping. The instrument focuses on the problem at hand and reflects the individual's cognitive and behavioral efforts to resolve problems. The CRI considers an individual's orientation towards a stressor and divides coping into two categories: approach and avoidance. It further divides these domains into categories that reflect behavioral and cognitive ways of coping (Moos, 1993a). According to Moos, the questionnaire has indicated a moderate to high internal consistency with a reliability coefficient ranging from .58 to .74.

The CRI consists of eight scales that make up cognitive and behavioral orientations of coping. These two coping styles are then divided into approach and avoidance responses. These include:

1. Logical Analysis (LA), which measures cognitive attempts to understand and prepare mentally for a stressor and its consequence,
2. Positive Reappraisal (PR), which measures cognitive attempts to construe and restructure a problem in a positive manner while still accepting the reality of the situation,
3. Seeking Guidance and Support (SG), which measures behavioral attempts to seek information, guidance, or support,
4. Problem Solving (PS), which measures behavioral attempts to take action to deal with the problem at hand,
5. Cognitive Avoidance (CA), which measures cognitive attempts to avoid thinking realistically about the problem,
6. Acceptance or Resignation (AR), which measures cognitive attempts to react to the problem by accepting it,
7. Seeking Alternative Rewards (SR), which measures behavioral attempts to become involved in alternative activities and create a new source of satisfaction, and

8. Emotional Discharge (ED), which measures behavioral attempts to reduce tension by negatively expressing feelings (Moos, 1993a).

The data gathered from these eight scales will guide this study's findings.

The scales will assist in determining if fathers in the study approach their spouses' struggles with PPD in a behavioral or cognitive manner. Most importantly, the results will determine if fathers responded to stressors by approaching or avoiding the problem or situation at hand. According to Moos (1993a), the first four scales (LA, PR, CA, and AR) measure *approach coping* and the second set of four scales (SG, PS, SR, and ED) measures *avoidance coping*.

### **Potential Risks and Benefits for Participants**

The nature of this study might have posed discomfort for participants as it focused on personal aspects of their life and intimate relationships. By discomfort, the researcher is referring to rating intimate details about their relationship, their personal beliefs about gender roles, the way they perceive problems or situations, or feeling judged as a result of their responses. As a result, participants might have experienced uncomfortable emotions or reactions. The questionnaires may have triggered complicated thoughts or feelings about themselves or their relationship. For instance, in answering the RAS, a participant may have realized that he was not satisfied in his relationship. To ensure that their needs were



supported, participants were encouraged to contact this writer to debrief or for referrals to mental or medical providers.

To ensure anonymity, participants were assigned a number once their packets were received. Confidentiality was provided for participants for the duration of the study. Documents were kept in a locked filing cabinet behind a locked door and information entered in the computer was password protected. All identifying information was destroyed at the end of the study.

The significance of this line of investigation was intended to prompt medical and mental health professionals, along with other professionals in the field of psychology, to screen fathers routinely during the postnatal period, to learn about their coping styles, and/or to encourage their participation in services provided to their partner. Additional purposes of this research included inspiring medical and mental health professionals to develop support groups or classes acknowledging and validating fathers' experiences, to create psychoeducational handouts or resources specific to fathers' needs during this period, and, most importantly, to encourage the development of therapeutic skills or interventions that may assist fathers to better cope with their spouses' symptoms of PPD or during the postnatal period in general.

**Potential challenges.** This study was foreseen to encounter a few challenges. For instance, the paper-pencil method may have reduced the number of returned packets, fathers may have been limited in their time to participate as they were adjusting to their infant, and it was only offered to the English-speaking population. Additionally, personal information from participants was not provided by participating clinics or agencies, which may have further limited the number of participants recruited. Further, the inconvenience of taking the packet to the post-office may have posed challenges in returning packets.

**Ethical assurances.** This study adhered to the standards published by the American Psychological Association (APA). Participants in the study were protected under the guidelines of the Antioch University Institutional Review Board (IRB). The study was also continuously reviewed by the institution's IRB to ensure that it met APA standards. All participants were invited to volunteer their participation and given the right to withdraw from the study at any time with absolutely no consequences or penalty if they decided to do so. Once recruited, participants were provided with a consent form explaining procedures, participation, rights, confidentiality, compensation, and potential risks and benefits. Please refer to Appendix A for a copy of the consent form.

## **Data Analysis**

Data for each case study were acquired and entered into a Microsoft Excel spreadsheet. The CRI, RAS, IRI (IRIec and IRIpt), and SRES standardized tests were then scored per participant. Each case study is presented, beginning with the participant demographics, followed by the scores from standardized tests. These data sources were then triangulated to enable a fuller interpretation of each case. Lastly, the hypotheses were tested across the five case studies, addressing whether fathers living with partners suffering from symptoms of PPD differed in coping styles (Hypothesis 1), relationship satisfaction (Hypothesis 2), empathy (Hypothesis 3), and perceived gender roles (Hypothesis 4). Further, data were triangulated to determine whether relationship satisfaction (Hypothesis 2a), empathy (Hypothesis 3a), and perceived gender roles (Hypothesis 4a) were associated with coping styles in fathers with partners suffering from PPD (G. Zarow, personal communication, September 10, 2012).

## **CHAPTER IV: Results**

The purpose of this study was to investigate differences in fathers' coping styles in the context of living with a partner with PPD. It also investigated the relationship between fathers' coping styles and their level of relationship satisfaction, empathy, and gender roles. Data were gathered through the use of four questionnaires and a demographic sheet.

This chapter describes the sample, depicting each participant through the use of a case study approach. This is followed by the participants' scores on each questionnaire. It concludes with an interpretation of participants' scores.

A shift took place in the interpretation of results. The researcher initially opted to analyze participants' data by using Statistical Package for the Social Sciences (SPSS) software. The goal was to analyze variables through the use of an analysis of variance (ANOVA), to use multiple regression analysis to investigate the predictive relationship of each independent variable to the dependent variable, to use descriptive statistics to assess for central tendency (means and mode), to measure variability (standard deviations for interval data, frequencies and percentages for nominal data) of variables, and to use correlation coefficients to analyze how the dependent and independent variables. However, the researcher was faced with an extremely low sample ( $N = 5$ ). As a result, the

researcher sought expert advice on data interpretation of such a small quantitative sample.

The researcher contacted and consulted with Diane M. Dusick, Ph.D., Greg Zarow, Ph.D., and Deborah Moffett, Ph.D., all of whom are experts in statistical research. Communication with these professionals was exchanged via email and by telephone. Dr. Dusick relayed that running data would not provide the researcher with reliable information, but that she could run a nonparametric statistics. However, Dr. Dusick cautioned that even if the results were significant, which was rather unlikely, the generalizability of the study would be minimal. She also suggested running descriptive statistics by looking at each individual case to gather trends (D. M. Dusick, personal communication, August 30, 2012). Likewise, Dr. Zarow, an expert in the field of experimental research, indicated that SPSS would not provide the researcher with significant results. He suggested taking a case study approach and looking at trends within their data results. He offered to also run correlation statistics that might indicate correlations between variables in the sample (G. Zarow, personal communication, August 30, 2012). The researcher opted to employ Dr. Zarow's expertise to assist with data interpretation. To further ensure the appropriateness of the case study approach, this investigator submitted information to Dr. Moffett and requested her advice.

Dr. Moffett concurred with the idea of taking a case study approach, as it would work well for the sample (D. Moffett, personal communication, September 6, 2012).

### **Description of Sample**

Participants were five fathers whose partners were suffering from symptoms of PPD ( $N = 5$ ). One participant in the sample identified himself as Hispanic, two self-identified as Latino, and two self-identified as Caucasian. Participants ranged from 27 to 46 years of age ( $M = 32$ ). Two of five participants were married at the time of the study, while three of the five were not married. Four fathers reported being familiar with PPD; one was not familiar with PPD. One of five reported having experienced depressive symptoms, and four of five reported not having ever experienced depressive symptoms. Four participants held full-time employment and one was unemployed. Three fathers held a high school diploma or equivalent and two had some college background. One participant reported having an income below \$9,999, one reported income between \$20,000-\$29,999, two reported income between \$30,000-\$39,000 and one reported income between \$40,000- \$49,999.

This sample was small, but diverse, including men who were married, unmarried, Latino/Hispanic, and Caucasian, as well as men who had experienced

depressive symptoms and men who had not experienced depressive symptoms. Educational backgrounds of participants differed. The sample included employed and unemployed men, with incomes ranging from below \$9,999 up to \$40,000-\$49,999, indicating a range that spans from poverty to middle income. Because the sample size is so small, results should be interpreted with caution. This sample was considered sufficient to proceed with hypothesis testing because these diverse participants included in the sample were all partners of mothers suffering from symptoms of PPD.

### **Hypothesis Testing**

Hypotheses were tested across five case studies. For each case study, demographics are reviewed, followed by a description of participant scores on the CRI, RAS, IRI (IRIec and IRIt), and SRES. Each case study is interpreted in relation to the hypotheses.

**Participant 1 (P1) case study.** P1 is a 46-year-old married man who identified himself as Latino. P1 holds a high school diploma or equivalent. P1 was employed full time and earned a yearly income of \$30,000-\$39,999. P1 has never experienced symptoms of depression. P1 was familiar with PPD.

***Coping Responses Inventory (CRI).*** P1 had somewhat above average coping overall (CRI t-score=55). P1 scored average on the Cognitive Scale

(CRICS t-score = 50). However, P1 scored somewhat below average on the Behavioral Scale (CRIBS t-score = 43).

P1 had an overall somewhat below average score on *Approach Coping Responses* (t-score = 44). P1 had a well below average score on Problem Solving (PS; t-score = 38) and on Logical Analysis (LA; t-score = 39). P1's Seeking Guidance and Support (SG) was in the somewhat below average range (t-score = 42). P1's Positive Reappraisal (PR) was somewhat average (t-score = 56).

P1 had an overall average score on *Avoidance Coping Responses* (t-score = 50). P1 scored in the somewhat below average range on the Acceptance or Resignation (AR; t-score = 44) and Seeking Alternative Rewards (AR; t-score = 42). P1 scored in the average range on Emotional Discharge (ED) Scales (t-score = 51) and in well above average on Cognitive Avoidance (CA; t-score = 62).

***Relationship Assessment Scale (RAS).*** P1 had a high relationship satisfaction score on the RAS (4.7).

***Interpersonal Reactivity Index (IRI): Empathy Concern (IRIec) and Perspective Taking (IRIpt).*** P1's IRI score on the IRIec subscale indicated empathy (18 out of 28). P1's perspective of others was relatively low (11 out of 28) on the IRIpt subscale.



***Sex-Role Egalitarian Scale (SRES).*** P1's score on the SRES (109 out of 125) depicted non-traditional or egalitarian gender role views.

***Interpretation of results for Participant 1 (P1).*** P1 is a 46-year-old Latino man who was reportedly aware of PPD. P1 obtained a high school diploma or equivalent and was employed full-time at the time of the study. P1 seems to hold non-traditional or egalitarian views on gender roles, as evidenced by his score on the SRES. P1's score also reflects a person who engages in dual parenting responsibilities. For instance, P1 strongly disagreed with the following statements: "a husband should leave the care of young babies to his wife" and "it is more appropriate for a mother, rather than a father, to change their baby's diapers." In addition, P1 disagreed with the following statement, "when a child awakens at night, the mother should take care of the child's needs." As it pertains to P1 and his partner's social life, P1 appears to engage in social activities that both enjoy. On the SRES, P1 strongly disagreed with the following, "when two people are dating, it is best if they base their social life around the man's friends." This may possibly speak to P1's high level of relationship satisfaction. On the RAS, P1 demonstrated loving his partner very much and perceiving his relationship as excellent in comparison to most relationships. P1 also felt that his

partner meets his needs, and that the relationship completely meets his expectations.

As it pertains to P1's interpersonal reactivity towards his partner and her current symptoms of PPD, P1 appeared to take an emotional stand rather than perspective taking. P1's perspective taking was relatively low, indicating difficulties understanding other's needs. The IRI scale asks participants to describe themselves by choosing an appropriate number on the 5-point Likert scale from 1 (does not describe me very well) to 5 (describes me very well). On the IRIpt subscale, P1 described himself as a 5 on the following, "If I am sure I am right about something, I don't waste much time listening to other people's arguments." P1 did not describe himself as a person that tries to imagine how others feel before criticizing them. In contrast, P1 described himself as having tender and concerned feelings for people less fortunate, and feeling bad for others when they are treated unfairly.

In P1's relationship with his partner and in trying to empathize with his partner's symptoms of PPD, one can infer that P1 may be more emotionally concerned about his partner's feelings, rather than trying to understand what she is going through. P1 may feel bad, but may lack the skills to address and understand his partner, which might also be reflective of his coping approach.

The CRI indicates that P1, on average, responds to his spouse's symptoms of PPD by avoiding them. P1's scores indicate that P1 will most likely attempt to avoid thinking realistically about a problem (CA). For instance, on an item in the CRI, P1 endorsed that he often tries "to put off thinking about the situation, even though [he] knew [he] would have to at some point." Nonetheless, at times P1 attempts to construe and restructure a problem in a positive manner (PR) by looking at the good side of problems or situations. An important thing to highlight in P1 is that he seldom engages in behavioral attempts to create new sources of satisfaction (SR) by turning to work or other activities to help him manage stress. Perhaps P1 responds by avoiding a problem or situation when faced with too many stimuli in the environment. Overall, P1 appears to cope with stressors in a cognitive manner rather than a behavioral one. This assertion is supported by P1's poor score on the PS scale, in that he indicates poor involvement in trying to solve problems.

Part 1 of the CRI allows individuals to describe the problem(s) or situation(s) they are experiencing. In this section, P1 described having financial difficulties, as his wife had lost her job. P1 also expressed difficulties paying for another baby and his wife's health problems during her pregnancy. P1 has reportedly faced similar problems in the past and was not expecting to encounter

these problems again. P1 did not have time to prepare for the problems and felt that the aforementioned problems were somewhat caused by something P1 had done. P1 also knew that the problems would pose challenges. However, P1 felt that something good came out of dealing with those problems.

Overall, P1 was highly satisfied with his relationship and holds non-traditional views on gender roles. P1 seems to lack some coping skills that could help him better address his partner's symptoms of PPD. Perhaps knowledge of and exposure to approach coping skills would help him develop better coping strategies while simultaneously increasing his empathic tendencies, such as perspective taking skills. .

**Participant 2 (P2) case study.** P2 is a 27-year-old unmarried man who identified himself as Caucasian. P2 had a high school diploma or equivalent, was unemployed, and earned a yearly income below \$9,999. P2 has experienced depressive symptoms in the past. P2 was familiar with PPD.

***Coping Responses Inventory (CRI).*** P2 had somewhat above average coping overall (CRI t-score=58). P2 scored average on the Cognitive Scale (CRICS t-score = 46). P2 also scored average on the Behavioral Scale (CRIBS t-score = 50).

P2 had an overall average score on *Approach Coping Responses* (t-score = 48). P2's Logical Analysis (LA) and Seeking Guidance and Support (SG) score was in the average range (t-score = 39) were well below the average range. P2's Positive Reappraisal (PR; t-score = 56) and Problem Solving (PR; t-score = 55) were somewhat above the average range.

P2 had an overall average score on *Avoidance Coping Responses* (t-score = 49). P2 scored in the well below average range on the Cognitive Avoidance (CA; t-score = 39). P2 was on the average range on the Seeking Alternative Rewards (AR; t-score = 48) and the Acceptance or Resignation Scales (AR; t-score = 49). P2 had a somewhat above average score on Emotional Discharge (ED) Scale (t-score = 57).

***Relationship Assessment Scale (RAS).*** P2 had a very high relationship satisfaction score on the RAS (5).

***Interpersonal Reactivity Index (IRI): Empathy Concern (IRIec) and Perspective Taking (IRIpt).*** P2's IRI score on the IRIec subscale indicated empathy (17 out of 28). P2's perspective of others was relatively low (12 out of 28) on the IRIpt subscale.

***Sex-Role Egalitarian Scale (SRES).*** P2's score on the SRES (89 out of 125) depicted non-traditional or egalitarian gender role views.

**Interpretation of results for Participant 2 (P2).** P2 is a 27-year-old Caucasian man who was reportedly aware of PPD. P2 has reportedly experienced symptoms of depression in the past. P2 obtained a high school diploma or equivalent and was unemployed at the time of the study. P2's score on the SRES reflect that he holds a somewhat egalitarian or non-traditional view on gender roles, as evidenced by his scores on the SRES. P2 remained neutral on statements such as "the husband should be the head of the family" and "it is more appropriate for a mother, rather than a father, to change their baby's diaper." P2 agreed that "when a child awakens at night, the mother should take care of the child's needs." Even though P2 agreed with or remained neutral regarding the aforementioned statements, P2 disagreed that "a husband should leave the care of young babies to his wife." These statements possibly indicate that P2 may not be highly involved in parental responsibilities.

In the context of his relationship, P2 endorsed being extremely satisfied with his partner and felt his partner met his needs extremely well. Overall, the P2 felt that his relationship completely met his expectations.

With respect to his interpersonal relationship with his partner, P2 had moderate levels of empathy and somewhat elevated levels of perspective taking, as indicated by his IRlec and IRlpt subscales. P2 describes himself as softhearted

person and feeling protective towards others when witnessing someone taking advantage of them. Moreover, P2 highly described himself as trying to look at everyone's side of a disagreement before making a decision; believing there are two sides to every question, and trying to look at them both; and putting himself in the other person's shoes, even when he is upset. In the context of his partner's symptoms of PPD, P2 may try to understand his partner by taking her thoughts into consideration, rather than her emotions.

P2's cognitive and emotional empathic tendencies seem to correlate with to his general style of coping in that he approaches his partner's symptoms of PPD similarly, through approach and avoidance styles. P2's scores indicate that he will make cognitive attempts to construe and restructure a problem in a positive manner while accepting the nature of the situation (PR), and that he might also engage in behavioral attempts to deal directly with the problem (PS). P2 fairly often engages in trying to make things work and encouraging himself to continue to work on problems. In contrast, P2 may engage in behavioral attempts to reduce tension by expressing negative feelings (ED), as evidenced by his response of "sometimes" to the following item, "Did you yell or shout to let off steam?" This behavior may potentially arise when P2 is feeling overwhelmed by too many stimuli in the environment or from his partner's symptoms of PPD.

Overall, P2 appears to have appropriate coping skills and tends to be understanding and empathic. Perhaps learning more coping skills would help buffer his skills and also allow for expressive communication by discussing issues with his partner.

**Participant 3 (P3) case study.** P3 is a 27-year-old unmarried man who identified himself as Hispanic. P3 obtained a high school diploma or equivalent, was employed full-time at the time of the study, and earned a yearly income of \$40,000-\$49,999. P3 has never experienced symptoms of depression. P3 was familiar with PPD.

***Coping Responses Inventory (CRI).*** P3 had well above average coping overall (CRI t-score = 64). P3 scored in the average range on the Cognitive Scale (CRI-CS t-score = 53). P3 scored in the average range on the Behavioral Scale (CRI-BS t-score = 46).

P3 had an overall average score on *Approach Coping Responses* (t-score = 50). P3's Logical Analysis (LA) score was in the somewhat below average range (t-score = 44). P3's Problem Solving (PR; t-score = 48) and Seeking Guidance and Support Scales (SG; t-score = 52) were in the average range. P3's Positive Reappraisal (PR) score was somewhat above average (t-score = 56).



P3 had an overall average score on *Avoidance Coping Responses* (t-score = 49). P3 scored in the well below average range on the Seeking Alternative Rewards (AR; t-score = 37). P3 had an average score on the Emotional Discharge (ED; t-score = 48) and Cognitive Avoidance (CA; t-score = 48) scales. P3 was in the well above average range in the Acceptance or Resignation Scale (AR; t-score = 63).

***Relationship Assessment Scale (RAS).*** P3 had a very high relationship satisfaction score on the RAS (5).

***Interpersonal Reactivity Index (IRI): Empathy Concern (IRIec) and Perspective Taking (IRIpt).*** P3's IRI score on the IRIec subscale indicated empathy (13 out of 28). P3's perspective of others was relatively low (17 out of 28) on the IRIpt subscale.

***Sex-Role Egalitarian Scale (SRES).*** P1's score on the SRES (97 out of 125) depicted non-traditional or egalitarian gender role views.

***Interpretation of results for Participant 3 (P3).*** P3 is a 27-year-old Hispanic man who was reportedly aware of PPD. P3 obtained a high school diploma or equivalent and was employed full-time at the time of the study. P3 holds non-traditional or egalitarian views on gender roles, as evidenced by his scores on the SRES. P3's scores also reflect a person who engages in duals

parenting responsibilities. For instance, P3 strongly disagreed with the following statements: “A husband should leave the care of young babies to his wife” and “It is more appropriate for a mother, rather than a father, to change their baby’s diapers.” In addition, P3 disagreed with the following item: “When a child awakens at night, the mother should take care of the child’s needs.” P3 appears to be highly involved in his role as a father as evidenced by the items he endorsed. However, there is a possibility that P3 may not engage in household chores, as P3 disagreed with the following item: “Cleaning up the dishes should be the shared responsibility of husbands and wives.” P3 endorsed being extremely satisfied with his relationship and felt his fiancé met his needs extremely well. Overall, the relationship completely met his relationship expectations.

With respect to P3’s interpersonal relationship with his fiancé, P3 demonstrated low empathic concern and moderate levels of perspective taking, as indicated by his IRIec and IRIpt subscale scores. P3 appears to be more active in trying to understand his fiancé’s perspective as opposed to addressing her emotional needs. P3 described himself as softhearted but does not feel sorry for other people when they are having problems or feeling touched by events he witnesses. In contrast, P3 described himself as a person that looks at everybody’s side of a disagreement before making a decision and also believing that there are

two sides to every question and that he tries to look at them both. Moreover, P3 reportedly tends to imagine how he would feel if he found himself in the same situation as others before criticizing them. In the context of addressing his fiancé's symptoms of PPD, scores indicate that P3 might attempt to understand her viewpoint rather than addressing her emotional needs.

P3's CRI score describes him as taking a cognitive approach when faced with stressful situations. With respect to coping with his fiancé's symptoms of PPD, P3 appears to respond similarly by either approaching or avoiding the problem. At times, P3 tends to engage in cognitive attempts to construe and restructure a problem in a positive manner (PR): that is, by being optimistic about the problem. However, P3 is likely to engage in cognitive attempts to react to a problem before accepting it (AR). An important thing to highlight is that P3 does not become involved in substitute activities or create new sources of satisfaction (SR). That is, P3 does not spend time in recreational activities or turn to work to help manage stress.

Part 1 of the CRI allows individuals to describe the problem(s) or situation(s) they are experiencing. In this section, P3 described having financial problems during his fiancé's pregnancy, which resulted in her almost having a miscarriage. P3 also reported that it was difficult for P3 to cope with her physical

pain. He further reported feeling helpless. P3 has reportedly not dealt with similar problems as the ones previously mentioned and was not expecting them to occur. As a result, P3 was not prepared and found them to be challenging. However, something good reportedly came out of dealing with the problems.

**Participant 4 (P4) case study.** P4 is a 31-year-old unmarried man who identified himself as Latino. P4 has some college background, was employed full time, and earned a yearly income of \$20,000-\$29,999. P4 has never experienced symptoms of depression and was not familiar with PPD.

***Coping Responses Inventory (CRI).*** P4 had considerable below average coping overall (CRI t-score = 42). P4 scored in the average range on Behavioral orientation (CRIBS t-score = 47). However, P4 scored well below average range on the Cognitive orientation (CRICS t-score = 38).

P4 had an overall well below average score on *Approach Coping Responses* (t-score = 38). P4's Positive Reappraisal (PR) was considerably below average (t-score = 27). P4's Logical Analysis (LA) and Problem Solving (PR) scores were well below average (t-score = 37). However, P4's Seeking Guidance and Support (SG) score was in the average range (t-score = 49).

P4 had an overall average score on *Avoidance Coping Responses* (t-score = 48). P4 scored considerably below average range on the Acceptance or

Resignation (AR; t-score = 33) and Emotional Discharge (ED) scales (t-score = 39). P4 had an average score on Cognitive Avoidance (CA; t-score = 55) and a well above average score on Seeking Alternative Rewards (AR; t-score = 64).

***Relationship Assessment Scale (RAS).*** P4 had somewhat elevated levels of relationship satisfaction on the RAS (4.1)

***Interpersonal Reactivity Index (IRI): Empathy Concern (IRIec) and Perspective Taking (IRIpt).*** P4's IRI score on the IRIec subscale indicated empathy (18 out of 28). P4's perspective of others was relatively low (11 out of 28) on the IRIpt subscale.

***Sex-Role Egalitarian Scale (SRES).*** P4's score on the SRES (99 out of 125) depicted non-traditional or egalitarian gender role views.

***Interpretation of results for Participant 4 (P4).*** P4 is a 31-year-old Latino man who was reportedly unfamiliar with PPD. P4 obtained a high school diploma or equivalent and was employed full-time at the time of the study. P4's views on gender roles are non-traditional in nature, as evidenced by his answers on the SRES. For instance, P4 strongly disagreed with the following statement, "The family home will run better if the father, rather than the mother, sets the rules for the children." P4 also strongly disagreed with the statements, "When a child awakens at night, the mother should take care of the child's needs," and "It is

more appropriate for a mother, rather than a father, to change their baby's diapers." In addition, P4 agreed that "the husband should be the head of the family." As seen by his responses, P4 may engage in sharing parental responsibilities with his partner. P4's belief of being the head of household may potentially pose some difficulties in that he may feel burdened with the responsibilities of being the primary provider. In turn, this might impact his level of attunement to his partner's feelings

The inferences made in P4's SRES score may be indicative of his IRI scores on the IRIec and IRIpt subscales. P4's perspective taking was relatively low, although he did demonstrate some empathic tendencies. On the IRIpt subscale, P4 strongly felt that the following statements described him very well: "I sometimes find it difficult to see things from the 'other guy's' point of view" and "If I am sure I am right about something, I don't waste much time listening to other people's arguments." However, P4 also endorsed the statement, "I sometimes try to understand my friends better by imagining how things look from their perspective."

P4 appears to be somewhat emotionally attuned. Statements that he felt described him well on the IRIec subscale included, "When I see someone being taken advantage of, I feel kinds of protective towards them," and "I would

describe myself as a pretty soft-hearted person.” These statements may indicate that P4 is emotionally attuned to his partner and is understanding of what she is going through.

Overall, P4 is relatively highly satisfied in his relationship. P4 reportedly loves his partner very much and feels that his relationship has met his original expectations. P3 feels that his partner meets his needs, on average. P4’s feelings towards his partner and what she is currently going through may pose challenges for his coping abilities.

The CRI indicates that, on average, P4 responds to his partner’s symptoms of PPD by avoiding them. P4’s scores on the CA scale describe him as a person that avoids thinking of problems in a realistic manner. P4’s score on the SR scale were quite elevated, indicating that P4 sometimes gets involved in substitute activities or creates new sources of satisfaction. In addition, his score on the PS scale reflect that P4 never engages in behavioral attempts to take action or deals directly with problems, but on some occasions, as indicated by scale SG, P4 may engage in attempts to resolve problems. Furthermore, P4 does not appear to engage in behavioral attempts to reduce tension by expressing his negative feelings, such as yelling or shouting to let off steam.

P4's results depict him as a cognitively withdrawn person who avoids thinking about the stressors his wife is currently facing and a person that avoids taking action to resolve problems. The fact that P4 is withdrawn does not mean he does not care about his wife's current mental health condition. Rather, P4 appears to be empathic and is satisfied in his relationship. P4's poor score on the CRI may suggest a lack of appropriate coping skills to deal with his partner's PPD symptoms.

Part 1 of the CRI allows individuals to describe the problem(s) or situation(s) they are facing. In this section, P4 described feeling overwhelmed with household chores as well as parental responsibilities, such as bathing and feeding his baby, noting that his partner refrains from helping him. This, in turn, aggravates him and leads him to only care for himself and his daughter. P4 has reportedly not been faced with such problems before and did not think he would have to deal with them. P4 reportedly did not have time to prepare for the situation. P4 perceived his situation as challenging and believed he had a hand in causing it. However, P4 felt that something good came out of dealing with the problem and also felt that it was getting resolved.

**Participant 5 (P5) case study.** P5 is a 29-year-old married man who identified himself as Caucasian. P5 had attended some college, was employed



full-time, and earned a yearly income of \$30,000-\$39,999. P5 has reportedly never experienced symptoms of depression. P5 was familiar with PPD.

***Coping Responses Inventory (CRI).*** P5 had considerably above average coping overall (CRI t-score = 73). P5 scored in the average range on Cognitive Scale (CRICS t-score = 52). P5 scored in the average range on the Behavioral Scale (CRIBS t-score = 54).

P5 had an overall well below average score on *Approach Coping Responses* (t-score = 56). P5's score on Seeking Guidance and Support (SG) was in the average range (t-score = 47). P5's score on Problem Solving (PR) was somewhat above average (t-score = 55). P5's scores on Positive Reappraisal (PR; t-score = 60) and Logical Analysis (LA; t-score = 60) were well above average.

P5 had an overall average score on *Avoidance Coping Responses* (t-score = 50). P5 scored in the well below average range on the Acceptance or Resignation (AR; t-score = 40). P5 scored in the average range on the Cognitive Avoidance (CA; t-score = 48) and Seeking Alternative Rewards scales (AR; t-score = 48). However, P5 scored well above average on the Emotional Discharge (ED) scale (t-score = 63).

***Relationship Assessment Scale (RAS).*** P5 obtained a score of 4.7 on the RAS, which indicates high relationship satisfaction.

***Interpersonal Reactivity Index (IRI): Empathy Concern (IRIec) and Perspective Taking (IRIpt).*** P1's IRI score on the IRIec subscale indicated some level of empathy (16 out of 28). P1's perspective of others was relatively low (17 out of 28) on the IRIpt subscale.

***Sex-Role Egalitarian Scale (SRES).*** P1's score on the SRES (99 out of 125) depicted non-traditional or egalitarian gender role views.

***Interpretation of results for Participant 5 (P5).*** P5 is a 29-year-old Caucasian man who was reportedly aware of PPD. P5 has attended some college and was employed full-time at the time of the study. P5 appears to hold egalitarian or non-traditional views on gender roles, as evidenced by his SRES score. P5's scores describe him as a person who might share parental responsibilities with his spouse. For instance, P5 disagreed with the following statements: "A husband should leave the care of young babies to his wife" and "It is more appropriate for a mother, rather than a father, to change their baby's diapers." In addition, P5 disagreed with the following item: "When a child awakens at night, the mother should take care of the child's needs." P5 seemed to engage not only in parental responsibilities, but also in helping his wife with household chores. P5 agreed with the statement, "Cleaning up the dishes should be the shared responsibility of husbands and wives." In the context of his

relationship, P5 endorsed being extremely satisfied with his wife and felt that she met his needs extremely well. Overall, the relationship met his expectations.

With respect to his interpersonal relationship with his wife, P5 demonstrated low empathic concern and moderate levels of perspective taking, as indicated by his IRlec and IRlpt subscale scores. P5 appears to be more active in trying to understand his wife's perspective as opposed to addressing her emotional needs. In the IRlec subscale, he described himself as a person that feels protective of others when they are treated unfairly and did not describe himself as a softhearted person. However, P5 described himself as a person that feels bad for others when they are having problems. On the IRlpt subscale, P5 described himself as a person who does not waste much time listening to others when he is sure he is right about something. Nevertheless, P5 is able to see things from other people's perspective; he believes there are two sides to every problem and tries to look at them both. P5 is more likely to try to understand his wife's current symptoms of PPD by understanding her cognitive thought process, rather than understanding her on an emotional level. P5 appears to have difficulties expressing emotional concern for wife.

P5's scores on the IRI appear to correlate with his cognitive orientation and coping response on the CRI. The CRI describes him as taking a behavioral

approach when faced with stressful situations. His scores further indicate that he engages in approach coping responses when dealing with his wife's symptoms of PPD, in that P5 attempts to understand and prepare mentally for problems; attempts to construe and restructure problems in a positive manner; and at times may take action to deal directly with problems or seek information, guidance, or support. For instance, P5 reportedly that he fairly often maintains an optimistic standpoint about problems, seeking professional help, or trying at least two different ways to solve problems.

P5 does not seem to react to problems by accepting them or becoming involved in substitute activities that create a new source of satisfaction as ways to avoid the problem. For instance, P5 does not turn to work or recreational activities to help manage problems. At times, however, P5 may engage in behavioral attempts to reduce his tension by expressing negative feelings, such as yelling or shouting to let off steam. This may potentially occur when P5 is faced with too many stimuli in the environment or when problems become too difficult.

Part 1 of the CRI allows individuals to describe the problem(s) or situation(s) they are facing. In this section, P5 reported his problem was being fired from his job. P5 has not faced such problem in the past and did not expect this to occur. As a result, P5 was not prepared to handle the problem. P5

perceived his problem as both threatening and challenging. However, something good came out of dealing with that problem and it has since been resolved.

### **Summary of Hypotheses Testing**

#### **Research Question 1: Do men cope differently with their partners' postpartum depression?**

*Null Hypothesis 1.* Fathers with partners suffering from postpartum depression are similar in coping methods (cognitive and behavioral) or approaches (avoidance and approach). This null hypothesis was rejected. Differences were found in fathers' overall coping, coping methods, and approaches.

#### **Research Question 2: What is the level of relationship satisfaction in fathers when living with a partner suffering from postpartum depression and how does it relate to coping?**

*Null hypothesis 2.* Fathers with partners suffering from postpartum depression are similar in relationship satisfaction. Null hypothesis 2 was not rejected because fathers with partners suffering from PPD were similar in relationship satisfaction. All participants expressed high levels of satisfaction with their partners.

*Null hypothesis 2a.* Relationship satisfaction is not related to coping in fathers with partners suffering from postpartum depression. Null hypothesis 2a was not rejected, as level of relationship satisfaction appeared to be unrelated to fathers' coping styles.

**Research Question 3: Do fathers express empathy differently when living with a partner suffering from postpartum depression and how does it relate to coping?**

*Null hypothesis 3.* Fathers with partners suffering from postpartum depression are similar in empathy (perspective taking or empathy concern). Null hypothesis 3 was rejected. There were differences in the way fathers demonstrate empathy.

*Null Hypothesis 3a.* Empathy is not related to coping in fathers with partners suffering from postpartum depression. Null hypothesis 3a was not rejected. Scores in one participant demonstrated a slight relationship between empathy and coping but there was not enough evidence or significance to justify the rejection of null hypothesis.

**Research Question 4: Do fathers differ in gender role views and how do they relate to coping?**

***Null Hypothesis 4.*** Fathers with partners suffering from postpartum depression are similar in gender role views. Null hypothesis 4 was not rejected. Participants in this study were similar in their gender role views in that they all held non-traditional or egalitarian gender role views.

***Null Hypothesis 4a.*** Gender roles are not related to coping in fathers with partners suffering from postpartum depression. Null hypothesis 4 was not rejected because no relationship was evident between gender role views and coping styles in fathers who have partners suffering from PPD.

### **Summary of Results**

The present study found that coping styles vary in fathers who are living with partners suffering from symptoms of PPD. The majority of partners in this study responded to their partners' symptoms of PPD by engaging in avoidance responses. Relationship satisfaction was high in all participants and all participants endorsed non-traditional or egalitarian views on gender roles. Empathy varied among participating fathers. These results are discussed in the following chapter in relation to previously published studies and the theoretical framework of the present study, along with implications and areas for future research.

## **CHAPTER V: Discussion and Conclusion**

This study investigated differences in coping style among fathers whose partners are experiencing symptoms of PPD. This study also explored the relationship between coping styles and fathers' level of relationship satisfaction, empathy, and gender roles. Quantifiable measures were implemented to explore similarities and differences in coping and to determine possible relationships between coping and relationship satisfaction, empathy, and perceived gender roles. Results were presented through case studies to characterize each participant's coping style, and the relationship between their coping and level of relationship satisfaction, empathy, and gender roles in the context of living with a partner suffering from symptoms of PPD.

This chapter begins with a review of major findings for each research question. Major findings are presented as rejecting or not rejecting the null hypothesis, followed by a comparison of these findings to previously published research studies and the theoretical framework of the present study. Poignant aspects of each case study are highlighted. Implications are discussed, followed by limitations of the present study, areas for future research, and a conclusion.



## **Review of Major Findings**

**Coping.** Research Question 1 asked, Do men cope differently with their partners' postpartum depression? Null hypothesis 1 proposed that fathers living with partners suffering from symptoms of postpartum depression are similar in coping methods (cognitive and behavioral) or approaches (avoidance and approach).

This null hypothesis was rejected. Differences were found in fathers' overall coping, coping methods, and approaches. These findings were consistent with Moos' (1993b) theoretical framework of coping. In Moos' framework, individuals engage in different styles of coping (cognitive or behavioral) and manage the situation or problem by engaging in avoidant or approach coping. Fathers' overall coping ranged from somewhat below average to somewhat above average. P4 scored the lowest in coping, whereas P5 scored highest. Differences in coping methods were also found. Three of the five participants engaged in behavioral methods. P2 and P5 were more likely to keep away from people in general, express frustration by yelling, or engage in activities they thought were effective to help their emotional state. P4 was most likely to engage in behavioral attempts to create new sources of satisfaction, such as engaging in new activities or tuning to work to manage stress. In contrast, two of the five participants

engaged in cognitive methods. P1 and P3 were more likely to engage in this method by maintaining a negative belief about their partners' symptoms of PPD or disregarding the problem(s).

Participants also differed in their coping responses. Three of the five participants engaged in avoidance coping responses when addressing their partners' PPD. Avoidance coping was evident in participants' cognitive attempts to avoid thinking about problems and behavioral attempts to avoid solving problems. One of the five engaged in approach coping responses. Approach coping responses were captured by cognitive attempts to understand, construe, or restructure problems and accept the reality of situation, as well as behavioral attempts to take action to deal with problems or seek resources that would assist in resolving problems. One of the five responded similarly by engaging in both approach and avoidance coping. Although participants differed in their coping methods and responses, their scores appeared to be within the average range, with the exception of P4 who scored well below average on cognitive methods of coping and P1 who scored well below average on behavioral methods of coping.

The study's findings do not appear to correlate with literature indicating that men frequently engage in instrumental coping styles (Matud, 2004), as only two of five participants appeared to engage frequently in active attempts to solve

problems. However, there was some correlation with Letourneau et al.'s (2011) findings, which indicated that male participants in their study engaged in avoidant seeking behaviors (i.e. escaping to work, isolating themselves from certain social events, avoiding others) to cope with their partners' PPD. The majority of the participants in this study appeared to engage in both cognitive and behavioral attempts to avoid problems. Likewise, findings from this study correlated with those of Felsten (1998), who indicated that a number of studies have consistently found that men are less likely to utilize behavioral attempts to seek support.

**Relationship satisfaction.** Research question 2 asked, What is the level of relationship satisfaction in fathers when living with a partner suffering from postpartum depression and how does it relate to coping? Null hypothesis 2 proposed that fathers with partners suffering from postpartum depression are similar in relationship satisfaction. Null hypothesis 2a proposed that relationship satisfaction is not related to coping in fathers with partners suffering from postpartum depression.

The null hypothesis was not rejected. Fathers with partners suffering from PPD were similar in terms of relationship satisfaction. All participants expressed high satisfaction with their partners. Null hypothesis 2a was not rejected, as level of relationship satisfaction did not appear to impact fathers' coping styles. Coping

styles among fathers all appeared to be within the average range. P4 scored slightly lower than other participants on relationship satisfaction, but P4's score still indicated elevated levels of satisfaction. Two of the five participants described being extremely satisfied in their relationships. These findings may suggest that even though coping styles differ, fathers can still be highly satisfied.

The findings in this study were not consistent with published studies indicating that transition to parenthood decreases a couple's level of marital satisfaction (Page & Wilhelm, 2007) or that couples experience more problems when a partner is taxed by his spouse's PPD (Meghan et al. (1999). Most importantly, the findings of this study contrast with the association found by a number of studies indicating that postpartum depressive symptoms are associated with low marital satisfaction (Davey et al., 2006; Misri et al., 2000; Page & Wilhelm, 2007).

**Empathy.** Research Question 3 asked, Do fathers express empathy differently when living with a partner suffering from postpartum depression and how does it relate to coping? Null hypothesis 3 proposed that fathers with partners suffering from postpartum depression are similar in empathy (perspective taking or empathy concern). Null Hypothesis 3a proposed that empathy is not related to coping in fathers with partners suffering from postpartum depression.

Null hypothesis 3 was rejected. All participants in the study demonstrated a sense of empathy, however, differences were found in the way fathers demonstrate empathy. Participants engaged in empathic concern and perspective taking when addressing their partners' symptoms of PPD. Two of the five participants engaged in tendencies of empathic concern by sympathizing with and expressing concern for their partners. In contrast, two of the five participants engaged in tendencies of perspective taking by taking the psychological viewpoint of their partners. One of the five engaged almost equally in both empathic concern and perspective taking.

Null hypothesis 3a was not rejected. There was a slight correlation between empathy and coping in P1's scores but the scores were not significant to justify the rejection of the null hypothesis. For instance, P1's empathic concern appeared to have some influence on the logical analysis approach coping scale (LA). P1's low levels on the perspective taking subscale may have potentially been associated with low scores on the cognitive avoidance coping scale (CA). Although, there was a slightly noted relationship between empathy and coping, it was only found in one of five participants. Furthermore, P1's overall coping was somewhat above average.

The present findings were consistent with the findings of Morgan et al. (1997); in that some partners of spouses suffering from PPD empathized by providing emotional understanding. However, the present findings were not consistent with Meghan et al.'s (1999) finding that deep empathy and concern for their mates were common traits among participants. Empathy existed among fathers in this study, but scores were not indicative of *deep* empathy.

**Gender role views.** Research Question 4 asked, Do fathers differ in gender role views and how do they relate to coping? Null Hypothesis 4 proposed that fathers with partners suffering from postpartum depression are similar in gender role views. Null Hypothesis 4a proposed that gender roles are not related to coping in fathers with partners suffering from postpartum depression.

Null hypothesis 4 was not rejected. Participants in this study were similar in their non-traditional or egalitarian gender role views. P1 held the strongest non-traditional or egalitarian role among the five participants. Null hypothesis 4a was not rejected. Even though data from two participants indicated a possible relationship between gender role views and coping there was not significant evidence to reject hypothesis 4a. For instance, in the SRES, two of the five participants (P4 and P5) agreed that the husband should be the head of household. Perhaps the weight of this traditional belief might have influenced the way fathers

coped with their partners' symptoms of PPD. The speculation about the traditional belief in P4 may have been related to his overall coping style which was somewhat below average. However, the same speculation did not relate to P5's overall coping score, as his coping was considerably above average, the highest of all participants. Moreover, the slight relationship noticed between traditional gender views and coping in P4 could have possibly been impacted by another variable, such as his being unaware of PPD. Overall, the findings and slight associations were not significant to reject hypothesis 4a.

These findings were not consistent with studies showing that fathers' coping styles are influenced by traditional views (Meghan et al., 1999). However, in at least one of the cases, a father's perceptions about his role as may have been influenced by a myth that "mothers are the nurturers and that fathers are providers," (Barnes, 2006, p. 30). The finding does not appear to be significant, but there was a slight association. Moreover, fathers in this study held non-traditional/egalitarian gender views which appears to be consistent with Cabrera et al.'s (2000) findings, stating that in recent generations, some men have adopted a more egalitarian gender role specific to work, home and family responsibilities.

## **General Discussion**

This study indicates the importance of having effective coping skills. Such skills are an integral part of individuals' lives, as they determine the effectiveness of problem solving or approach taking. According to Beutler et al. (2001), coping skills are essential in that they reflect the effectiveness of an individual's response to stressful situations. In the context of this study, coping skills assisted to a certain extent in dealing with participants' partners' symptoms of PPD. Some participants seemed to demonstrate effective coping strategies, while others lacked skills that might have helped them better deal with the situation at hand.

Most theorists have identified coping as having two functions: regulation of distress and the management of the problem(s) (Folkman & Moskowitz, 2000; Matud, 2004; Moos, 1993b). Coping is also influenced by the way in which the stressful situation is characterized, its controllability, social resources, and individual personality (Folkman & Moskowitz, 2000) and temperaments (Beutler et al., 2001). Therefore, individual variations exist in the way people respond to stressful life events (Page & Wilhelm, 2007). The current study correlates with the aforementioned findings in that fathers' coping styles differed, as they used approaches and different styles of orientation when addressing their partners' PPD. This is important to consider in the field of psychology when treating this



population, especially for counselors, clinicians, mental health workers, or psychologists. The awareness that fathers engage in different approaches and orientations to cope with their partners' PPD may lead these professionals to assess for coping skills. Doing so might help facilitate the therapeutic process.

Professionals in the field of psychology can guide themselves by the theoretical coping framework this study adopted. Assessment through the use of Moos' (1993a) CRI may help determine coping approaches emphasizing individuals' coping styles: the individual's orientation (cognitive or behavioral) towards a problem and response (approach coping or avoidance coping).

This study also considered other factors that might influence fathers' coping skills. Results on the relationship between coping and level of relationship satisfaction, empathy, and gender roles were not highly significant in this study. Although these results were not statistically significant, they are important to highlight. In this study, fathers reported to be highly satisfied with their partners and demonstrated empathic tendencies. Some fathers demonstrated empathy by being emotionally attuned to their partners while others showed they were cognizant of their partner's cognitions. Moreover, all of the fathers in the study held non-traditional or egalitarian views on gender roles. Of note is that a

significant relationship between coping and the aforementioned variables may be seen with a larger sample.

Relationship satisfaction, empathy, and gender roles did not appear to have a clear impact on fathers' coping abilities. Nonetheless, these variables might be important to consider when professionals in the field of psychology are treating this population. A brief evaluation of each independent variable investigated in this study may provide professionals with further insight about male clients struggling to cope with partners' symptoms of PPD.

### **Implications**

Most of the fathers in the study responded to their partners' symptoms of PPD with avoidance coping. This may imply that these fathers potentially lack appropriate coping skills when dealing with stressful situations. The clinical psychology community needs to be aware that coping strategies vary among fathers whose partners are suffering from PPD, and that avoidance may be present.

This study found high relationship satisfaction among fathers despite their partners' struggle with PPD. Research findings indicated that relationship satisfaction has been correlated with maternal depression (Davey et al., 2006; Page & Wilhelm, 2007). This discrepancy in the findings may best be described

by the support that participants are providing to their partners in the postpartum period. Literature findings address the importance of support from family or the non-depressed partner, as high support leads to a healthier relationship and higher relationship satisfaction (Misri et al., 2000; Page & Wilhelm, 2007). Similarly, Purdom et al.'s (2006) study on support and relationship satisfaction found a strong association between the two. Furthermore, Barnes (2006) found that men who were more satisfied in their marriages provided higher levels of support to their wives as opposed to men who were less satisfied in their marriages. This may potentially imply that fathers in this study were highly supportive of their partners, and that women's struggle with PPD may not necessarily indicate that their partners are dissatisfied in their relationship.

One of five (20%) participants reported having ever experienced sadness, loneliness, emptiness, crying spells, or loss of interest in activities. This finding could potentially imply that men are prone to experience depressive symptoms during the postnatal period, and that routine screening in men during this period is important. This is consistent with Barnes' (2006) finding, which indicates that men who care for a spouse that has been diagnosed with PPD also experienced depression. Soliday et al.'s (1999) study on postpartum affect and depressive symptoms in mother and fathers found that, in nearly half the couples, at least one

parent reported depressive symptoms, and in 20% of couples, both experienced elevated symptoms. Paulson et al. (2006) reported that 14% of mothers and an almost equal proportion of fathers (10%) struggle with moderate to severe depression in the first year following the birth of a child. The implication is that the clinical psychology community needs to be aware that fathers living with partners suffering from PPD may themselves be experiencing symptoms of depression.

One of the five participants (20%) was not aware of PPD. This implies that some fathers may not be aware of PPD. This finding is of particular importance because fathers may have difficulty understanding their partners' experiences with PPD. This same father scored low on the IRI perspective taking subscale. It is possible that his lack of awareness may have influenced his ability to understand his partner's experience with PPD. Morgan et al. (1997) studied postnatally distressed women and their partners and found that many of the fathers in the study appeared to experience difficulty understanding their partners' experience with PPD. The partners tried to empathize with their spouses but alluded feeling helpless. Fathers may be empathic, but the notion of not understanding PPD creates more difficulty in their efforts to provide support.

**Recommendations**

Since fathers living with partners suffering from PPD differ in awareness of PPD, coping styles, perceptions of gender roles, and personal levels of depression. It is recommended that clinical psychologists, mental health professionals, and medical professional assess fathers' level of coping, awareness of PPD, coping styles, perceptions of gender roles, and personal levels of depression. This may help determine their level of coping skills at the forefront of the therapeutic process and set the foundation for therapeutic goals. For medical professionals, this may be central to connecting fathers to community resources. It is also highly recommended that professionals in the medical and mental health field routinely screen fathers for depressive symptoms during the postnatal period. It is also important that professionals create psychoeducational brochures because they may give fathers insight about PPD, PPD signs and risks, as well as community resources, support groups, and psychotherapeutic services available to them.

The range of coping skills evident in the present study may suggest that clinicians working with this population ought to consider coping skills training for fathers with partners suffering from symptoms of PPD. Increasing coping skills in fathers may also help them to engage in approach coping responses when

addressing their partners' symptoms of PPD. Further, clinicians must be aware that fathers living with partners suffering from symptoms of PPD may themselves need treatment for depression.

### **Limitations**

This study was limited by the small sample, which limits the generalizability of the findings. In recruiting the sample, several obstacles were encountered that limited the recruitment of participants, including the lengthy process of obtaining permission from County Public Health Clinics, and the lack of receptiveness by agencies, clinics, and private practices. Further, the sample included generally low levels of education among participants, with no college graduates included. This study was targeted toward the English-speaking population. For these reasons, findings should be generalized with caution.

This study was also limited by the measures. Measures were self-report which may lead to question the degree of honesty in each participant's response. Only single measures were used for each construct and no behavioral measures or third party measures were included to externally verify self-report data.

This study was further limited by the design, which was cross-sectional and not longitudinal. Therefore, stability of findings and possible effects of treatment were not included, nor was a control group. A control group would have

been useful in determining how fathers whose partners suffer from PPD may differ from fathers whose partners who do not have PPD.

### **Areas for Future Research**

The present study should be replicated with a larger sample. The utilization of multiple measures of outcomes should also be taken into consideration if the study is replicated and perhaps a longitudinal design to measure stability over time. The use of control groups is important, as it will allow the researcher to see how individuals are affected by PPD itself. In addition to quantitative measures, future scholars should seek to use qualitative interview methodology with open-ended questions to obtain a narrative of experiences. This can bring a level of understanding and consistency that paper-pencil tests cannot provide.

The effectiveness of support groups for fathers during the postnatal period should also be investigated to further understand fathers' coping skills or lack thereof, which can be accomplished by measuring coping skills through the use of a pretest/posttest approach. Moreover, future studies should investigate the intriguing relationship between each variable – relationship satisfaction, empathy and gender roles – and coping. Perhaps there might be a difference with a larger sample or a specific population.

**Conclusion**

The present study found that men differ in coping styles when confronted with their partners' symptoms of PPD. Fathers in the study differed in both cognitive and behavioral orientation to avoidance and approach coping responses. Relationship satisfaction was high for all of the five participants, regardless of their coping style. Fathers also demonstrated a degree of healthy empathy and described themselves as having non-traditional gender roles. These findings suggest fathers are diverse in their coping styles, which is important information for the clinical psychology community in terms of their ability to deliver care and services to fathers living with partners suffering from symptoms of PPD.



## REFERENCES

- Addis, M. E. (2008). Gender and depression in men. *Clinical Psychology: Science and Practice*, 15(3), 153-168. doi:10.1111/j.1468-2850.2008.00125.x
- Allen, K. (2010). *Father experience of postpartum depression*. (Doctoral dissertation). Retrieved from ProQuest Dissertations and Theses. (UMI No. 3411567)
- American Psychiatric Association. (2000). *Diagnostic and statistical manual of mental disorders* (4th ed.). Washington, DC: Author.
- American Psychological Association. (2005). *Men: A different depression*. Retrieved from <http://www.apa.org/research/action/men.aspx>
- Anthes, E. (2010). The problem of postpartum depression in fathers. *Slate Magazine*. Retrieved from [http://www.slate.com/articles/double\\_x/doublex/2010/11/dads\\_get\\_blue\\_too.html](http://www.slate.com/articles/double_x/doublex/2010/11/dads_get_blue_too.html)
- Barnes, D. L. (2006). Postpartum depression: Its impact on couples and marital satisfaction. *Journal of Systemic Therapies*, 25(3), 25-39. doi:10.1521/jsyt.2006.25.3.25

- Beutler, L.E., Brookman, L., Harwood, T.M., Alimohamed, S. & Malik, M. (2001). Functional impairment and coping style. *Psychotherapy*, 38(4), 437-442. doi:10.1037//0033-3204.38.4.437
- Bem, S. (1974). The measure of psychological androgyny. *Journal of Counseling and Clinical Psychology*, 42(2), 155-162. doi:10.1037/h0036215
- Bielawska-Batorowicz, E., & Kossakowska-Petrycka, K. (2006). Depressive mood in men after the birth of their offspring in relation to a partner's depression, social support, fathers' personality and prenatal expectations. *Journal of Reproductive Infant Psychology*, 24(1), 21-29. doi:10.1080/02646830500475179
- Billings, A. G., & Moos, R. H. (1981). The role of coping responses and social resources in attenuating the stress of life events. *Journal of Behavioral Medicine*, 4(2), 139-157. doi:10.1007/BF00844267
- Boath, E. A., Pryce, A. J., & Cox, J. L. (1998). Postnatal depression: the impact on the family. *Journal of Reproductive and Infant Psychology*, 16 (2/3), 199-203. doi:10.1080/02646839808404568
- Boyce, P., & Hickey, A. (2005). Psychosocial risk factors to major depression after childbirth. *Social Psychiatry and Psychiatric Epidemiology*, 40, 605-612. doi:10.1007/s00127-005-0931-0

- Buist, A., Morse, C. A., & Durkin, S. (2002). Men's adjustment to fatherhood: Implications for obstetric health care. *Journal of Obstetric, Gynecologic, & Neonatal Nursing*, 32(2). 172-180.
- Cabrera, J. N., Tamis-LeMonda, S. C., Bradley, R., Hofferth, S. & Lamb, E. M. (2000). Fatherhood in the twenty-first century. *Child Development*, 71(1). 127-136. doi:10.1111/1467-8624.00126
- Carr, L. (1994). The strengths and weaknesses of quantitative and qualitative research: What method for nursing? *Journal of Advanced Learning*, 20, 716-721. doi:10.1046/j.1365-2648.1994.20040716.x
- Centers for Disease Control and Prevention, (2012). *Depression among women of reproductive age and postpartum depression*. Retrieved from <http://www.cdc.gov/reproductivehealth/depression/>
- Cochran, S. V., & Rabinowitz, F. E. (2003). Gender-sensitive recommendations for assessment and treatment of depression in men. *Professional Psychology, Research and Practice*, 34(2). 132-140. doi:10.1037/0735-7028.34.2.132
- Condon, J. T., Boyce, P., & Corkindale, C. J. (2003). The first-time father's study: A prospective study of the mental health and wellbeing of men during the

- transition to parenthood. *Australian and New Zealand Journal of Psychiatry*, 38, 56-64. doi:10.1046/j.1440-1665.2003.00521.x
- Creswell, J. W. (2009). *Research design: Qualitative, quantitative, and mixed methods approaches* (3<sup>rd</sup> ed.). New Delhi, India: Sage.
- Daniels, A. (2011, March 27). Can men get postpartum depression? *Men's Health*. Retrieved from <http://blogs.menshealth.com/health-headlines/can-men-get-post-partum-depression/2011/03/27>
- Davis, M. H. (1980). A multidimensional approach to individual differences in empathy. *JSAS Catalog of Selected Documents in Psychology*, 10, 85-104. Retrieved from [http://www.uv.es/~friasnav/Davis\\_1980.pdf](http://www.uv.es/~friasnav/Davis_1980.pdf)
- Davis, M. H. (1983). Measuring individual differences in empathy: Evidence for multidimensional approach. *Journal of Personality and Social Psychology*, 44(1), 113-126. doi:10.1037//0022-3514.44.1.113
- Davey, S., Dziurawiec, S., & O'Brien-Malone, A. (2006). Men's voices: Postnatal depression from the perspective of male partners. *Qualitative Health Research*, 16(2), 206-220. doi:10.1177/1049732305281950
- Deave, T., & Johnson, D. (2008). The transition to parenthood: what does it mean for fathers? *Journal of Advanced Nursing*, 63(6), 626-633. doi:10.1111/j.1365-2648.2008.04748.x

- Diemer, A. G. (1997). Expectant fathers: Influence of perinatal education on stress, coping, and spousal relations. *Research in Nursing & Health*, 20, 281-293. doi:10.1002/(SICI)1098-240X(199708)20:4<281::AID-NUR2>3.0.CO;2-C
- Edhborg, M. (2008). Comparisons of different instruments to measure blues and to predict depressive symptoms 2 months postpartum: A study of new mothers and fathers. *Scandinavian Journal of Caring Sciences*, 22, 186-195. doi:10.1111/j.1471-6712.2007.00512.x
- Edmondson, O. J. H., Psychogiou, L., Vlachos, H., Netsi, E., & Ramchandani, P. G. (2010). Depression in fathers in the postnatal period: Assessment of the Edinburgh Postnatal Depression Scale as a screening measure. *Journal of Affective Disorders*, 125, 365-368. doi: 10.1016/j.jad.2010.01.069
- Everingham, C. R., Heading, G., & Connor, L. (2006). Couples' experiences of postnatal depression: A framing analysis of cultural identity, gender and communication. *Social Science & Medicine*, 62, 1745-1756. doi:10.1016/j.socscimed.2005.08.039
- Felsten, G. (1998). Gender and coping: Use of distinct strategies and association with stress and depression. *Anxiety, Stress and Coping*, 11, 289-309. doi:10.1080/10615809808248316

- Folkman, S., & Moskowitz, T. J. (2000). Positive affect and the other side of coping. *American Psychologist*, 55(6), 647-654. doi:10.1037//0003-066X.55.6.647
- Glavin, K. (2012). Screening and prevention of postnatal depression. In M.G. Rojas Castillo (Ed.), *Perinatal depression* (pp. 2-18). New York, NY: InTech. Retrieved from: <http://www.intechopen.com/books/perinatal-depression/screening-and-prevention-of-postnatal-depression>
- Goodman, J. (2004). Paternal postpartum depression, its relationship to maternal postpartum depression, and implications for family health. *Journal of Advanced Nursing*, 45(1), 26-35. doi:10.1046/j.1365-2648.2003.02857.x
- Graham, J. M., Diebels, J. K., & Barnow, B. Z. (2011). The reliability of relationship satisfaction: A reliability generalization meta-analysis. *Journal of Family Psychology*, 25, 39-48. doi:10.1037/a0022441
- Hammer, J. H., & Good, G. (2010). Positive psychology: An empirical examination of beneficial aspects of endorsement of masculine norms. *Psychology of Men and Masculinity*, 11, 303-318. doi:10.1037/a0019056
- Harris, B. (2002). Postpartum depression. *Psychiatric Annals*, 32(7), 405-414.

- Hendrick, S. S., Dicks, A., & Hendrick, C. (1998). The relationship assessment scale. *Journal of Science and Personal Relationship*, 15(1), 137-142.  
doi:10.1177/0265407598151009
- Hung, C. (2004). Predictors of postpartum women's health status. *Journal of Nursing Scholarship*, 36(4), 345-357. doi:10.1111/j.1547-5069.2004.04062.x
- Kane, W. E. (2000). Racial and ethnic variations in gender-related attitudes. *Annual Reviews Sociology*, 26, 419-439.  
doi:10.1146/annurev.soc.26.1.419
- Kara, B., Unalan, P., Cifcili, S., Cebeci, D.S. & Sarper, N. (2008). Is there a role for the family and close community to help reduce the risk of postpartum depression in new mothers? A cross-sectional study of Turkish women. *Maternal Child Health*, 12, 155-161. doi:10.1007/s10995-007-0232-1
- Kim, P., & Swain, J. E. (2007). Sad dads: Paternal postpartum depression. *Psychiatry Review*, 4, 36-47.
- King, L. A., & King, D. W. (1993). *Manual for the sex-role egalitarianism scale: An instrument to measure attitudes towards gender-role equality*. Detroit, MI: Research Psychological Association.

- King, L. A., & King, D. W. (1997). Sex-role egalitarianism scale: Development, psychometric properties and recommendations for future research. *Psychology of Women Quarterly*, 21, 71-87. doi:10.1111/j.1471-6402.1997.tb00101.x
- Klein, K. J. K., & Hodges, S. D. (2001). Gender differences, motivation and empathic accuracy: When it pays to understand. *Society for Personality and Social Psychology*, 27(6). 720-730. doi:10.1177/0146167201276007
- Letourneau, N., Duffett-Leger, L., Dennis, C. L. & Stewart, M., & Tryphonopoulos, P. D. (2011). Identifying the support needs of fathers affected by post-partum depression: A pilot study. *Journal of Psychiatric and Mental Health Nursing*, 18, 41-47. doi:10.1111/j.1365-2850.2010.01627.x
- Madsen, S. A., & Burges, A. (2010). Fatherhood and mental health difficulties in the postnatal period. In D. Conrad & A. White (Eds.), *Promoting men's mental health* (pp. 74-82). United Kingdom: Redcliffe.
- Martin J. A., Hamilton, B. E., Ventura, S. J. Osterman, M., Wilson, E. C., & Mathews, T. J. (2012). Births: Final data for 2010. *National Vital Statistics Reports*, 61(1). 1-100.



- Matthey, S., Barnett, B., Howie, P., & Kavanagh, D. J. (2001). Validation of Edinburgh Postnatal Depression Scale for men, and comparison of item endorsement with their partners. *Journal of Affective Disorders*, 64, 175-184. doi:10.1016/S0165-0327(00)00236-6
- Matthey, S., Barnett, B., Howie, P., & Kavanagh, D. J. (2003). Diagnosing postpartum depression in mothers and fathers: Whatever happened to anxiety? *Journal of Affective Disorders*, 74, 139-147. doi:10.1016/S0165-0327(02)00012-5
- Matthey, S., Barnett, B., Ungerer, J. & Waters, B. (2000). Paternal and maternal depression during the transition to parenthood. *Journal of Affective Disorders*, 60, 75-85. doi:10.1016/S0165-0327(99)00159-7
- Matud, P. M. (2004). Gender differences in stress and coping styles. *Personality and Individual Differences*, 37, 1401-1415. doi:10.1016/j.paid.2004.01.010
- Meghan, M., Davis, M.W., Thomas, S., & Droppleman, P. (1999). Living with postpartum depression: The father's experience. *Journal of Maternal Child Nursing*, 24(4), 202-208.
- McCoy, S. J. B. (2012). Postpartum depression in men. In M.G. Rojas Castillo (Ed.), *Perinatal depression* (pp. 163-176). New York, NY: InTech.

Retrieved from: <http://www.intechopen.com/books/perinatal-depression/postpartum-depression-in-men->

- Miller, L. J. (2002). Postpartum depression. *Journal of the American Medical Association*, 287(6), 762-765. doi:10.1001/jama.287.6.762
- Misri, S., Kostaras, X., Fox, D., & Kostaras, D. (2000). The impact of intimate partner support in the treatment of postpartum depression. *Canadian Journal of Psychiatry*, 45, 554-558.
- Moos, R. H. (1993a). *Coping Responses Inventory: CRI-Adult form professional manual*. Lutz, FL: Psychological Assessment Resources.
- Moos, R. H. (1993b). Development and applications of new measures of life stressors, social resources and coping responses. *European Journal of Psychological Assessment*, 11 (1). 1-13.
- Moos, R. H. (2004). *Coping Responses Inventory: An update on research application and validity*. Lutz, FL: Psychological Assessment Resources.
- Morgan, M., Matthey, S., Barnett, B. & Richardson, C. (1997). A group programme for postnatally distressed women and their partners. *Journal of Advanced Nursing*, 26, 913-920. doi:10.1046/j.1365-2648.1997.00433.x
- Moran, T. E., & O'Hara, M. W. (2006). A partner-rating scale of postpartum depression: The Edinburgh Postnatal Depression Scale-Partner (EPDS-P).

*Archives of Women's Mental Health*, 9, 173-180. doi:10.1007/s00737-006-0136-x

Page, M., & Wilhelm, M. (2007). Postpartum daily stress, relationship quality and depressive symptoms. *Contemporary Family Therapy*, 29, 237-251. doi:10.1007/s10591-007-9043-1

Paulson, F. J., & Bazemore, S.D. (2010). Prenatal and postpartum depression in fathers and its association with maternal depression. *Journal of the American Medical Association*, 303 (9), 1961-1968.

Paulson, F. J., Dauber, S. & Leiferman, A. J. (2006). Individual and combined effects postpartum depression in mothers and fathers on parenting behavior. *Pediatrics*, 118(2), 659-668. doi:10.1542/peds.2005-2948

Peloquin, K., & LaFontaine, M. (2010). Measuring empathy in couples: Validity and reliability of interpersonal reactivity index for couples. *Journal of Personality Assessment*, 92(2). 146-157.

Premberg, A., & Lundegren, I. (2006). Father's experience of childbirth education. *Journal of Perinatal Education*, 15(2). 21-28. doi:10.1624/105812406X107780

- Pringle, E. (2009). *Sad daddies: The mother Act Disease Mongering Campaign- Part IV*. Retrieved from [http://www.naturalnews.com/026926\\_depression\\_drug\\_WHO.html#ixzz231pk1nNR](http://www.naturalnews.com/026926_depression_drug_WHO.html#ixzz231pk1nNR)
- Purdom, C. L., Lucas, J. L. & Miller, K. S. (2006). Couple type, parental status and the mediating impact of social support. *North American Journal of Psychology*, 8(1), 1-12.
- Roberts, S. L., Bushnell, R. J., Collings, S. C., & Purdie, G. L. (2006). Psychological health of men with partners who have post-partum depression. *Australian and New Zealand Journal of Psychiatry*, 40, 704-711. doi:10.1080/j.1440-1614.2006.01871.x
- Ryan, A. B. (2006) Post-positivist approaches to research. In M. Antonescu, H. Fallon, A. B. Ryan, A. Ryan, T. Walsh, & L. Borys, L. (Eds.), *Researching and writing your thesis: A guide for postgraduate students* (pp. 12-26). Kildare, Ireland: Maynooth Adult and Community Education.
- Seiffge-Krenke, I. (2006). Coping with relationship stressors: The impact of different working models of attachment and links to adaptation. *Journal of Youth and Adolescence*, 35(1), 25-39. doi:10.1007/s10964-005-9015-4

- Siu M. A., & Shek, T. L. D. (2005). Validation of the interpersonal reactivity index in a Chinese context. *Research of Social Work Practice, 15*(2), 118-126. doi:10.1177/1049731504270384
- Soliday, E., McCluskey-Fawcett, K., & O'Brien, M. (1999). Postpartum affect and depressive symptoms in mothers and fathers. *American Journal of Orthopsychiatry, 69*(1), 30-38. doi:10.1037/h0080379
- Spector, A. Z. (2006). Fatherhood and depression: A review of risks, effects, and clinical application. *Mental Health Nursing, 27*(8), 867-883. doi:10.1080/01612840600840844
- Svajl, J. M. (2012, March 14). *Re : Qualitative psychology & (some) difficulties in quantitative methods* [Web log comment]. Retrieved from <http://makersidiom.wordpress.com/2012/03/14/qualitative-psychology-some-difficulties-in-quantitative-methods/>
- Trede, K., Baldessarini, R.J., Viguera, A.C., & Bottéro, A(2009). Treatise on insanity in pregnant, postpartum, and lactating Women (1858) by Louis-Victor Marcé: A Commentary. *Harvard Review of Psychiatry, 17* (2). 157-165.
- USA Today. (2007). Parenting: Fathers also experience postpartum depression. *135*(2741), 3-3.

- Vaughn, M., & Matyastik-Baier, E. M. (1999). Reliability and validity of the relationship assessment scale. *The American Journal of Family Therapy*, 27, 137-147. doi:10.1080/019261899262023
- Wang, S. S. (2010, May 19). New dads, too, can suffer depression. *Wall Street Journal*. Retrieved from <http://online.wsj.com/>
- Walker, D. F., Tokar, D. M., & Fischer, R. A. (2000). What are eight popular masculinity-related instruments measuring? Underlying dimensions and their relations to sociosexuality. *Psychology of Men & Masculinity*, 1(2). 98-108. doi:10.1037//1524-9220.1.2.98
- Zheng, L., & Zheng, Y. (2011). The relationship of masculinity and femininity to the big five personality dimensions among a Chinese sample. *Social Behavioral and Personality*, 39(4), 445-450. doi:10.2224/sbp.2011.39.4.445

## Appendix A:

### Informed Consent Form

Antioch University  
Department of Clinical Psychology  
602 Anacapa St., Santa Barbara, CA 93101  
(805) 962-8179  
Salvador Treviño, Ph.D., J.D.: Dissertation Chair

*Fatherhood and a Partner's Postpartum Depression: Coping, Relationship  
Satisfaction, Gender Roles, and Empathy*

Dear Participants,

My name is Martha G. Ruiz and I am a doctoral student in Clinical Psychology at Antioch University in Santa Barbara, California. To fulfill the requirements for my degree, I am conducting a study on men's ability to cope with their partner's postpartum depression.

Please be aware that your participation in this study is strictly voluntary. In order to qualify for this study, you must be 18 years of age or older, new father, biological father of the child and your partner must have been recently with postpartum depression by a mental or medical health professional.

Once you volunteer, you will be asked to fill out four questionnaires. They will take approximately 45 minutes to an hour to complete. You will then return the complete questionnaires in the stamped self-addressed envelope provided, by **??, 2012**. Your records will be kept confidential in a locked filing cabinet. The signed informed consent form will be kept separate from other questionnaires and all identifying data will be destroyed upon completion. You may choose to withdraw from the study at any time and also have the right to not answer any question that you do not wish to. There will be absolutely no consequences or penalty if you decide to withdraw from the study.

Once completed questionnaires are gathered, there will be 4 drawings that will allow participants to win a \$50 visa gift cards. If your name is drawn, the gift card will be mailed to you at the address provided in the demographic section. Your participation in the study may elicit insights and can also evoke some

thoughts and feelings you might like to address in therapy or in other support groups you might be involved in.

I sincerely appreciate your participation in this study. It is my hope that your participation in this study will contribute to community awareness about factors that influence fathers' ability to cope with their partner's postpartum depression. If you are interested in participating in this study, or have any questions, please feel free to email me at [mruiz1@antioch.edu](mailto:mruiz1@antioch.edu) or call me at (805) 284-5337. Please note that I am available to speak to you after you complete the questionnaires for any questions or referrals. Thank you very much for your consideration.

Sincerely,

A handwritten signature in dark ink, appearing to read 'M.G. Ruiz', with a stylized flourish at the end.

Martha G. Ruiz, M.A.  
Doctoral Candidate

I have read this consent form and understand that this study is of a research nature. It may offer no direct benefit to me. Participation in this study is voluntary. I may refuse to enter it or may withdraw at any time without creating any harmful consequences to myself. I understand also that the investigator may drop me at any time from the study.

If you understand the information we have given you, and would like to take part in this research study and also agree to allow your information to be used as described above, then please sign below:

**Name:** \_\_\_\_\_ **Signature:** \_\_\_\_\_

**Date:** \_\_\_\_\_



**Appendix B:****Recruit Letter**

Antioch University  
Department of Clinical Psychology  
602 Anacapa Street, Santa Barbara, CA 93101  
(805) 962-8179  
Salvador Treviño, Ph.D., J.D.: Dissertation Chair

*Fatherhood and a Partner's Postpartum Depression: Coping, Relationship  
Satisfaction, Gender Roles, and Empathy*

Dear \_\_\_\_\_,

My name is Martha G. Ruiz and I am a doctoral student in Clinical Psychology at Antioch University in Santa Barbara, California. To fulfill the requirements for my degree, I am conducting a research study on factors that influence men's ability to cope with their partner's postpartum depression. The purpose of the study is to bring awareness to medical and mental health communities about father's underlying issues or experiences.

My goal is to recruit participants directly or indirectly through their partner. I am particularly, interested in your private clinic as it provides services to mothers who may possibly have postpartum depression. To qualify for this study, participant's partner must be experiencing symptoms of postpartum depression. I sincerely appreciate any assistance your practice can provide me.

I am anticipated to recruit most of my participants by ??, 2012. If your office is able to provide me with support during this study, please feel free to contact me for further information at mruiz1@antioch.edu or phone number (805) 284-5337. Thank you very much for your time and consideration.

Sincerely,



Martha G. Ruiz, M.A.  
Doctoral Candidate

**Appendix C:****Form B***Fatherhood and a Partner's Postpartum Depression: Coping, Relationship Satisfaction, Gender Roles, and Empathy*

THIS FORM IS TO BE COMPLETED BEFORE RESEARCH BEGINS

Insuring Informed Consent of Participants in Research:  
Questions to be answered by AUSB Researchers

- 1. Are your proposed participants capable of giving informed consent? Are the persons in your research population in a free-choice situation?...or are they constrained by age or other factors that limit their capacity to choose? For example, are they adults, or students who might be beholden to the institution in which they are enrolled, or prisoners, or children, or mentally or emotionally disabled? How will they be recruited? Does the inducement to participate significantly reduce their ability to choose freely or not to participate?**

The participants in this research study must be of legal age to qualify for participation. Participants will be recruited from private and public medical and mental health clinics, post-partum depression groups, private practices (MFT, LCSW, Psychologists) and non-profit agencies providing therapeutic support to individuals, children and families. If necessary, a brief presentation will be conducted to potential participating agencies to provide more details about the study.

The criteria for the men nominated will be: 1) must be 18 years of age or older 2) partners must be diagnosed with postpartum depression 3) men must be unborn child's biological father 4) English speaking.

**2. How are your participants to be involved in the study?**

Participants will complete four questionnaires, taking approximately forty-five minutes to complete. They will then return the completed questionnaires in the self-addressed stamped envelope provided or drop it off at the participating agency or office.

**3. What are the potential risks – physical, psychological, social, legal, or other? If you feel your participants will experience “no known risks” of any kind, indicate why you believe this to be so. If your methods do create potential risks, say why other methods you have considered were rejected in favor of the method chosen.**

The nature of this study might pose a risk for participants as it focuses on personal aspects of their life. As a result, participants might experience negative emotions or reactions. To ensure that their needs are supported, participants will be encouraged to contact this writer to debrief or for referral. To address these potential negative emotions, participants will be provided with referrals for therapeutic services.

**4. What procedures, including procedures to safeguard confidentiality, are you using to protect against or minimize potential risks, and how will you assess the effectiveness of those procedures?**

Confidentiality will be provided for the participants. To maintain anonymity all information will be kept in a locked filing cabinet behind a locked door. In addition, the computer will be password protected as well as files containing participants' information. To further protect their identity, participants will be assigned a number.

**5. Have you obtained (or will you obtain) consent from your participants in writing? (Attach a copy of the form.)**

Each participant will receive a letter regarding informed consent. This letter will explain, in detail, what is expected of them and how the study process will be conducted. (Please refer to APENDIX A).

**6. What are the benefits to society, and to your participants that will accrue from your investigation?**

The benefits from this study are intended to 1) bring awareness to the community, public/private medical and mental health sectors about father's experiences/ability to cope with their partner/spouse' postpartum depression 2) to assist in the development of handouts/pamphlets, support groups and/or classes acknowledging father's experiences.

Furthermore, participants who send complete questionnaires will enter a drawing. The drawing will take place at the end of the study, at which point

four \$50 Visa gift cards will be drawn. Gift cards will be mailed to the participants' address, provided in the demographic form (APPENDIX B).

**7. Do you judge that the benefits justify the risks in your proposed research? Indicate why.**

As mentioned above, the nature of this study may generate negative consequences and participants will not be allowed to process thoughts and feelings that the study may trigger. To ensure that their needs are supported, participants will be encouraged to contact this writer to debrief or for referrals. To address these potential negative emotions, participants will be provided with referrals for therapeutic services.

It is believed that the study's benefits may justify any risks, as it is intended to create awareness (community, public and private mental health and health clinics) about men's experience. By doing so, informational services could possibly be developed specifically for me. The study, in particular, has minimum risks involved for the participants, as they are of legal age and have the right to withdraw at any time without suffering consequences.

**Both the student and his/her Dissertation Chair must sign this form and submit it before any research begins. Signatures indicate that, after**

**considering the questions above, both student and faculty person believe that the conditions necessary for informed consent have been satisfied.**

Date: \_\_\_\_\_ Sign: \_\_\_\_\_  
Student

Date: \_\_\_\_\_ Sign: \_\_\_\_\_  
Dissertation Chair

When completed, this form should be included in the proposal and the final paper.

**Appendix D:**  
**Demographic Questionnaire**

The following information is being collected to accurately describe each participant in the study. Please answer the following questions to the best of your abilities.

Name:	
Address:	
Phone Number:	

The above information will be kept confidential and will be placed in a secure location. It will solely be used for the purpose of **mailing your gift card** (if you win) once your questionnaire packet has been received. All identifying information will be destroyed upon completion of the study.

1. What is your age?
  - ☐ 18-25
  - ☐ 26-33
  - ☐ 34-41
  - ☐ 42-49
  - ☐ Over 50
2. Are you married?
  - ☐ Yes
  - ☐ No
3. Were you aware/familiar with Post-Partum Depression?
  - ☐ Yes
  - ☐ No
4. Have you ever experienced sadness, loneliness, emptiness, crying spells, loss of interest in activities?
  - ☐ Yes
  - ☐ No

5. What is your highest level of education?
- ☐ High School or Equivalent
  - ☐ Some College
  - ☐ Bachelor's Degree
  - ☐ Master's Degree
  - ☐ Professional Degree (Ph.D., M.D., J.D., etc)
  - ☐ Other \_\_\_\_\_
6. How would you classify yourself?
- ☐ Asian/Pacific Islander
  - ☐ Arab
  - ☐ African American/Black
  - ☐ Caucasian White
  - ☐ Hispanic
  - ☐ Latino
  - ☐ Multiracial
  - ☐ Other \_\_\_\_\_
7. What is your employment status?
- ☐ Employed Full Time
  - ☐ Employed Part Time
  - ☐ Unemployed
  - ☐ Other \_\_\_\_\_
8. What is your average yearly income?
- ☐ Below 9,999
  - ☐ 9,999-19,999
  - ☐ 20,000-29,999
  - ☐ 30,000-39,999
  - ☐ 40,000-49,999
  - ☐ 50,000 and above
9. Please feel free to add additional information and/or make comments:

---

---

---

---

---



## Appendix E:

### Interpersonal Reactivity Index (IRI)

The following statements ask about your thoughts and feelings in a variety of situations. For each item, show how well it describes you by choosing the appropriate number on the scale at the top of the page: 1, 2, 3, 4, or 5. When you have decided on your answer, fill in the letter in the blank next to the item.

**READ EACH ITEM CAREFULLY BEFORE RESPONDING.** Answer as honestly and as accurately as you can. Thank you. (*Italics are reverse scored items*)

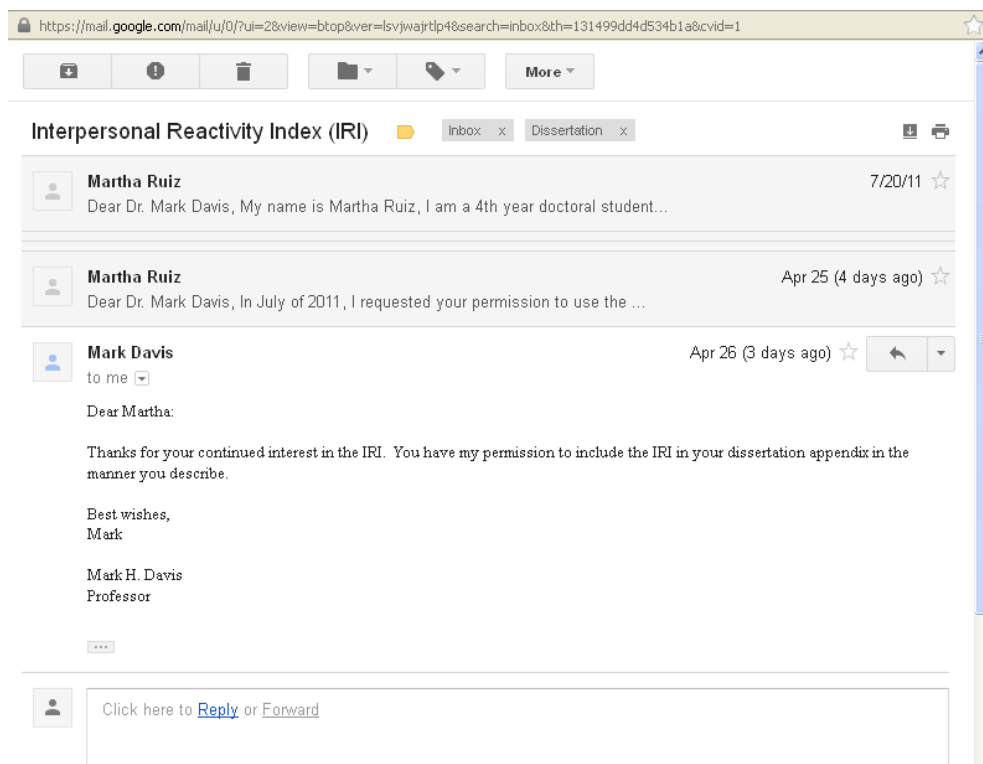
#### ANSWER SCALE:

1	2	3	4	5
<b>DOES NOT DESCRIBE ME WELL</b>				<b>DESCRIBES ME VERY WELL</b>

- \_\_\_ 1. I daydream and fantasize, with some regularity, about things that might happen to me.
- \_\_\_ 2. I often have tender, concerned feelings for people less fortunate than me.
- \_\_\_ 3. *I sometimes find it difficult to see things from the "other guy's" point of view.*
- \_\_\_ 4. *Sometimes I don't feel very sorry for other people when they are having problems.*
- \_\_\_ 5. I really get involved with the feelings of the characters in a novel.
- \_\_\_ 6. In emergency situations, I feel apprehensive and ill-at-ease.
- \_\_\_ 7. *I am usually objective when I watch a movie or play, and I don't often get completely caught up in it.*

- \_\_\_ 8. I try to look at everybody's side of a disagreement before I make a decision.
- \_\_\_ 9. When I see someone being taken advantage of, I feel kind of protective towards them.
- \_\_\_ 10. I sometimes feel helpless when I am in the middle of a very emotional situation.
- \_\_\_ 11. I sometimes try to understand my friends better by imagining how things look from their perspective.
- \_\_\_ 12. *Becoming extremely involved in a good book or movie is somewhat rare for me.*
- \_\_\_ 13. *When I see someone get hurt, I tend to remain calm.*
- \_\_\_ 14. *Other people's misfortunes do not usually disturb me a great deal.*
- \_\_\_ 15. *If I'm sure I'm right about something, I don't waste much time listening to other people's arguments.*
- \_\_\_ 16. After seeing a play or movie, I have felt as though I were one of the characters.
- \_\_\_ 17. Being in a tense emotional situation scares me.
- \_\_\_ 18. *When I see someone being treated unfairly, I sometimes don't feel very much pity for them.*
- \_\_\_ 19. *I am usually pretty effective in dealing with emergencies.*
- \_\_\_ 20. I am often quite touched by things I see happen.
- \_\_\_ 21. I believe that there are two sides to every question and try to look at them both.
- \_\_\_ 22. I would describe myself as a pretty soft-hearted person.

- \_\_\_ 23. When I watch a good movie, I can very easily put myself in the place of a leading character.
- \_\_\_ 24. I tend to lose control during emergencies.
- \_\_\_ 25. When I'm upset at someone, I usually try to "put myself in his shoes" for a while.
- \_\_\_ 26. When I'm reading an interesting story or novel, I imagine how I would feel if the events in the story were happening to me.
- \_\_\_ 27. When I see someone who badly needs help in an emergency, I go to pieces.
- \_\_\_ 28. Before criticizing somebody, I try to imagine how I would feel if I were in their place.



## Appendix F:

### Relationship Assessment Scale

Please mark on the answer sheet the letter for each item which best answers that item for you.

How well does your partner meet your needs?

A	B	C	D	E
Poorly		Average		Extremely well

In general, how satisfied are you with your relationship?

A	B	C	D	E
Unsatisfied		Average		Extremely satisfied

How good is your relationship compared to most?

A	B	C	D	E
Poor		Average		Excellent

How often do you wish you hadn't gotten in this relationship?

A	B	C	D	E
Never		Average		Very often

To what extent has your relationship met your original expectations:

A	B	C	D	E
Hardly at all		Average		Completely

How much do you love your partner?

A	B	C	D	E
Not much		Average		Very much

How many problems are there in your relationship?

A	B	C	D	E
Very few		Average		Very many

NOTE: Items 4 and 7 are reverse scored. A=1, B=2, C=3, D=4, E=5. You add up the items and divide by 7 to get a mean score.

Hendrick, S.S. (1998). Relationship assessment scale. *Measurement Instrument Database for the Social Sciences*. Retrieved 2012 from [www.mdss.ie](http://www.mdss.ie). This scale is made available under Creative Commons Attribution-NonCommercial 3.0 unported license. <http://creativecommons.org/licenses/by-nc/3.0/>

