THE RECOVERY EXPERIENCE FOR PERSONS WITH A MYOCARDIAL INFARCTION AND THEIR SPOUSES/PARTNERS

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Coronary heart disease, the leading cause of death in Americans today, affects both genders in numerous ethnic populations. This life-threatening event causes both physical and emotional distress for persons with a myocardial infarction (MI), as well as for their spouses or partners and thus possibly forces them on a spiritual journey. The purpose of this study was to increase the understanding of the ways in which spirituality is defined and experienced by both persons with an MI and their spouses/partners during the recovery process. The method utilized in this study was a qualitative approach using interpretative phenomenology from a Heideggerian philosophical perspective. A purposive sample was utilized to include 13 persons with an MI and their spouses/partners. The demographics of these couples varied in representation among age, gender, ethnicity, and socioeconomic status. Individual semistructured interviews were conducted with persons with an MI and their spouses/partners simultaneously within 6 weeks of the diagnosis and then 3 months after the diagnosis. The interpretative stages described by N. Diekelmann and P. Ironside (1998) served as a guide in data analysis. The findings revealed that persons with an MI and their spouses/partners defined spirituality within a religious context that was based upon their faith and beliefs, which were expressed through rituals and practices. These rituals and practices comprised the differences in the participants’ experience of spirituality. Participants received hope and support from a variety of sources which allowed them to survive the MI and to
progress through the recovery process. These participants’ survival caused many of them
to search for the meaning and purpose of the event and to believe that life changes were
needed. Because these participants were able to make lifestyle changes and adjustments
from physical, emotional, and spiritual perspectives, they were able to cope with the MI.
By examining the spirituality of both persons with an MI and their spouses/partners, I
gained insight into the recovery process from both a spiritual and a dyadic perspective.
DEDICATION

I dedicate this manuscript to some very special people who made this journey with me. To my husband, who gave so much support while waiting patiently for me as I spent many hours reading, thinking, and writing at my computer. To my parents, who traveled with me on several occasions to Birmingham so that I could read and study along the way. To the rest of my family, who made calls to say “hello” and offer words of encouragement. Last, to my extended family in Birmingham, who opened their home to me each week and allowed me to share in their lives. Without each of them, I would not have made it; I thank them for this moment.
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CHAPTER 1
INTRODUCTION

Coronary heart disease, the leading cause of death in Americans today, affects both genders in numerous ethnic populations (American Heart Association, 2007). Each year, more than 1 million Americans have a myocardial infarction (MI), the most visible sign of coronary heart disease, with approximately 452,000 infarctions resulting in death (American Heart Association). This life-threatening event causes both physical and emotional distress for persons with an MI, as well as for their spouses or partners, and thus possibly forces them on a spiritual journey.

The actual occurrence, as well as the uncertainty that often accompanies this disruptive event during the crisis period and during the recovery/convalescence process, precipitates physical and emotional stress for both the person with an MI and the person’s spouse (Fleury & Moore, 1999; Thompson & Cordle, 1988). This crisis was earlier noted by Granstrom (1985) in a study conducted with oncology patients. Granstrom found that illnesses or suffering can become “spiritual encounters, as well as physical and emotional experiences,” (p. 42) because individuals perceive a loss of control in their lives that forces them on a journey to seek “meaning and purpose” (p. 42). Ross (1994) found that illness, suffering, and crisis affect the physical, psychological, and sociological states of being for both the patient and the spouse and lead to an awareness of spirituality for patients and family members in their efforts to find meaning, purpose, and fulfillment. Furthermore, McLeod and Wright (2001) noted that health care professionals must “open
space” (p. 394) to spirituality because it is an important part of a person’s culture and “a way of understanding, making meaning, and being in the world” (p. 394).

Spirituality is perceived or defined as “a way of being and experiencing which comes about through awareness of a transcendent dimension and which is characterized by certain identifiable values with regard to self, others, nature and life” (Elkins, Hedstrom, Hughes, Leaf, & Saunders, 1988, p. 5). According to Ross (1995), spirituality cannot be categorized as a separate state of being but instead must be considered to be parallel to the biological, sociological, and psychological states of being. Bishop and Scudder (1997) noted in their interpretation of holistic nursing that spirituality gives actual meaning to these other states of being and in essence gives both patients and spouses “courage to face illness or death” (p. 109).

Problem Statement

Since the early 1980s, interest in the phenomenon of spirituality has increased in many disciplines and particularly in nursing. Previous research endeavors focused primarily on examining the spirituality of terminally ill and chronically ill patients and their spouses (Chang, Noonan, & Tennstedt, 1998; Coward, 1991; Granstrom, 1985; Gurklis & Menke, 1988; Kaye & Robinson, 1994; O’Neill & Kenny, 1998; Stiles, 1990). Several studies with chronically ill individuals demonstrated the relationship between spirituality and the enhanced ability to cope with the stress and illness (Coward; Gurklis & Menke); in addition, a study with caregivers of the chronically ill revealed spirituality to be a coping mechanism (Kaye & Robinson).

However, there has been limited research examining spirituality for persons with an MI and their spouses/partners individually, much less together. Furthermore, the
research studies that have been conducted have conceptualized and operationalized spirituality differently among the various populations (Clark & Heidenreich, 1995; Miller, 1989, 1991; O’Malley & Menke, 1988). Spirituality has been described or measured primarily as the element of hope from the perspective of the acutely ill patient (Clark & Heidenreich; Miller; O’Malley & Menke). Kettunen, Solovieva, Laamanen, and Santavirta (1999) and Miller (1991) investigated the element of hope as a dimension of spirituality but did so from the perspective of the acutely ill patient’s spouse.

Other studies were found to examine spirituality through the relationship of spiritual well-being and health outcomes or health-promoting behaviors (Landis, 1996; Mackenzie, Rajagopal, Meibohm, & Lavizzo-Mourey, 2000; McNulty, Livneh, & Wilson, 2004; Morris, 2001; Waite, Hawks, & Gast, 1999). Morris focused on the correlation of the progression or regression of coronary heart disease (health outcomes or health-promoting behaviors) with the spiritual well-being of the individual and concluded that spiritual activities such as meditation and relaxation methods may have increased the participants’ sense of spiritual well-being. This study (Morris) revealed the important role of spirituality in the health status of an acutely ill patient.

Ross (1995) revealed that spirituality is a component of the physical and psychosocial dimensions. However, the phenomenon lacks clarity and uniformity in its operationalization among various populations and particularly among acutely ill persons and their spouses/partners. Furthermore, despite the contributions of these research studies, there remains a limited universal understanding of how acutely ill persons and their spouses/partners describe and experience spirituality, either individually or as a couple.
According to Hilbert (1993), “illness is a family affair” (p. 200). From this study, Hilbert (1993) found that both the patient and the spouse perceived an MI as a life-threatening event causing both to experience considerable emotional distress. In a later study, Hilbert (1996) found once again that both the MI patient and the spouse experienced considerable emotional distress during hospitalization and 3 months later, with the spouse experiencing more stress during each of the two periods than the patient did. In a study conducted by Beach et al. (1992), both the emotional and the physical aspects of the recovery process for the patient were found to be influenced by the spouse’s ability to cope with situational stressors. Nyamathi (1987) found that sources of support for female spouses of MI patients during the acute phase of recovery were their husband, family, friends, and religious beliefs. Nyamathi’s findings were consistent with those of Underwood and Teresi (2002), who found that individuals experienced spirituality as a way of coping or as a form of social support. Spirituality enhanced an individual’s coping abilities; thus, more positive emotions were expressed. Hilbert (1993) noted that “the spouses’ positive emotions were more contagious” (p. 203). In other words, when a spouse provided positive emotional support, a sense of spiritual, physical, and emotional well-being occurred for the patient during the recovery/convalescence period. Klinger (1984) noted that, in her study, social support from the spouse was the most facilitating factor of health perceptions and compliance for the MI patient. Roberson (1985) further postulated that the beliefs of spirituality for both the patient and the spouse must be mutually acknowledged, respected, and supported for the wholeness of health, or unity of “mind, body, and spirit” (p. 62), to occur for the patient. Meyerstein (2005) found that introducing a spiritual perspective in focus groups offered a variety of
“spiritual coping tools” (p. 207) that helped family members to confront and handle the medical illness and thus provided a “healing time” (p. 207).

Several authors examined the connection of spirituality or spiritual well-being with marital adjustment and health. For instance, Roth (1988) found that there was a significant relationship between spiritual well-being and marital adjustment for both husbands and wives, possibly because the ability to understand “self” and to connect in other relationships “serves as a model for and enhances the ability to develop intimate relationships” (p. 156). Giblin (2004) further noted that the role of spirituality/religion influences marital health by fostering effective communication (prayer, meditation, or quiet time brings about self-awareness), accepting conflict (suffering, loss, and death bring about meaning and personal growth), making a commitment (commitment-no-matter-what brings about permanence and unity), and supporting community (reaching beyond the marital boundaries brings about connection, giving, and nurturing). Therefore, the spirituality of the person with an MI and that of the spouse/partner must be described and explored individually, as well as mutually, to gain a better understanding of this phenomenon. Furthermore, the recovery process in several of the studies included only the hospitalization period for MI patients. From the empirical literature, it can be determined that the recovery/convalescence process extends past hospitalization. Therefore, a better understanding of how spirituality influences the recovery/convalescence process may be gained by exploring a defined period beyond hospitalization.
Significance of the Study

By gaining a better understanding of spirituality, health care providers would be more aware of the meaning and importance of other supportive spiritual measures and would provide for them appropriately to enhance physiological, emotional, and spiritual well-being for persons with an MI and for their spouses/partners. Health care providers would be aware of other possible sources of support, such as ancillary personnel (e.g., a chaplain, social worker, counselor, and case manager) and family and community members, that could be incorporated into the care of persons with an MI and their spouses/partners during the hospitalization and the recovery. Furthermore, by examining spirituality in persons with an MI and in their spouses/partners, researchers would have a better insight into the acute and extended recovery process from both a spiritual and a dyadic perspective.

Purpose

The purpose of this study was to increase the understanding of the ways in which spirituality is defined and experienced by both persons with an MI and their spouses/partners in the recovery process. In this study, the recovery process was examined during the acute and extended phases.

Research Aim

This interpretative study was an attempt to capture, illuminate, and provide a better understanding of spirituality. This study may ultimately contribute to the promotion or enhancement of the delivery of spiritual care by health care professionals to persons with an MI and to their spouses/partners.
Research Questions

The primary research question for this study was as follows: What is the role of spirituality for persons with an MI and their spouses/partners during the recovery process? Other research questions that emerged from this primary research question are listed here:

1. How is spirituality defined and experienced by persons with an MI?
2. How is spirituality defined and experienced by spouses/partners of persons with an MI?
3. How is the experience of spirituality similar and different for persons with an MI and their spouses/partners?
4. How has the experience of spirituality affected the recovery process for persons with an MI and their spouses/partners?

Assumptions

1. An MI is an acute crisis that causes disruptions and challenges for persons with an MI and their spouses/partners.
2. An acute illness alters the state of well-being for persons with an MI and their spouses/partners.
3. Spirituality is a dimension within the context of the holistic perspective.
4. Spiritual well-being is necessary for overall health.

Research Paradigm of Interpretative Phenomenology

Philosophical Perspective of Phenomenology

Phenomenology, an approach to the naturalistic paradigm (Lincoln & Guba, 1985), is by its very nature the study of phenomena (Annells, 1996) and deals with
human experience (Munhall & Boyd, 1993). The phenomenological movement has focused upon human involvement in the world; thus, the terminology of lived experiences has evolved (Munhall & Boyd). According to Oiler (1982), the phenomenological approach has been aimed at “describing lived experiences” (p. 178) or, in other words, has represented an attempt to “describe human experience as it is lived” (p. 178). The perspective of phenomenology is to assume that there is a world and that “the world becomes real through contact with it” (Oiler, p. 179). This perspective constitutes the individual’s own perception of reality, which can be accessed by human expressions (Oiler).

Philosophy of Hermeneutics

The phenomenological movement has emerged and evolved from the philosophical ideas of scholars such as Edmund Husserl, Martin Heidegger, and Hans-Georg Gadamer. However, it was from the scholarly works of Martin Heidegger that a shift was made to another branch of phenomenology; this branch is referred to as hermeneutic phenomenology. The word *hermeneutics* is derived from a Greek word that suggests “the idea of bringing to understanding the particulars where the process involves language” (Benner, 1994, p. 55). The hermeneutic philosophy emphasizes language as the central important component of its tenets and “challenges the assumption that individuals create meaning” (Allen, 1995, p. 176). In other words, “language is more than a tool, but instead a way of being and is recognized in the fundamental way that one is one’s language” (Allen, p. 177). Therefore, linguistic context gives the only theoretical and practical way to think or understand. Furthermore, Heideggerian phenomenologists proposed that “all knowledge emanates from persons who are already in the world,
seeking to understand persons who are already in the world” (Benner, p. 55). This proposition implies that there is always a hermeneutic circle of interpretation. The circle, which serves as a metaphor, represents the circular movement between the parts and the whole of text within the seeking of understanding (Annells, 1996). Another essential tenet of this process of understanding includes the social, historical, and cultural background practices handed down to a person from birth. These practices are illuminated through the interpretation of everyday situations (Koch, 1995).

Interpretative phenomenology has provided an effective research approach in nursing to gain an understanding of human experience (Benner, 1994). However, when interpretative phenomenology is utilized, there are several assumptions based upon the Heidegger phenomenological view of person that must be acknowledged. The first assumption is that the commonalities in a researcher’s background allow for “a preliminary understanding of the human action being studied” (Benner, p. 57). Researchers, simply by being a part of the world, have a preunderstanding or a forestructure of understanding that is thrust upon them through their knowledge of the phenomenon and their development of the research questions. However, it is critical that the researcher’s interpretative lens guide him or her in a global way to the phenomenon being studied. Another assumption is that an individual is not “privileged to have a world that is atemporal and ahistorical because the researcher exists in the historical time just as the subject” (Benner, p. 57). Therefore, to be “objectively valid” (Benner, p. 58), the researcher and the participant must reach an agreement about the local culture and thus allow skills, practices, and meanings to be shared and therefore “verifiable with both research participants and colleagues” (Benner, p. 58).
Interpretative phenomenology is a means to “create new possibilities for understanding and to provide an opportunity to have a thoughtful and tactful engagement with the phenomenon” (Benner, 1994, p. 58). In this study, the interpretative phenomenology method of inquiry was utilized to create an understanding of the phenomenon, spirituality, through the contextual meaning provided by persons with an MI and their spouses/partners.
CHAPTER 2

REVIEW OF LITERATURE

Several areas of relevant literature are discussed in this chapter. These areas include experiencing an MI, recovering from an MI, and coping with an MI, as well as spirituality as coping, spirituality as hope, spiritual well-being, and spiritual development.

MI Survivors and Their Spouses

Experiencing an MI

The experience of an MI for both the person and the spouse has been examined in the literature for the past several decades (Bennett, 1992; Hilbert, 1996; Kettunen et al., 1999; Stewart, Davidson, Meade, Hirth, & Makrides, 2000; Theobald, 1997). Within these studies, numerous stressors such as intrapersonal emotions (fear, anxiety, and depression), physical and medical difficulties, family and social issues, and work or financial concerns have been identified by persons experiencing cardiac conditions. For instance, Bennett conducted a descriptive study of 64 post-MI participants (51 men ranging in age from 34 to 79 years, $M = 57$ years) who were enrolled in a Phase 2 cardiac rehabilitation program during the first 2 to 12 weeks after the cardiac event. These participants were asked in an open-ended question to describe “the event or situation they had been most concerned about during the past month” (Bennett, p. 323). The participants were also asked to determine “the amount of concern the individual felt about the threatening encounter which was measured on a 4-point response scale
Bennett found that threats ranged from the possibility of dying to employment to finances. The greatest perceived “threat” was related to physical concerns (i.e., the fear of another blockage or heart attack, arrhythmias, and/or pain).

Stewart et al. (2000) also identified fear, as well as uncertainty, as stressors that emerged initially for the MI survivor and the spouse. In a descriptive study of 14 first-time MI survivors (ranging in age from 42 to 71 years, $M = 57$ years) and their spouses (ranging from 40 to 66 years, $M = 56$ years) over a 12-week period, Stewart et al., through thematic content analysis, sought “to describe the stressors, coping strategies, and social support experienced by survivors and spouses” (p. 1352). They found that the need for lifestyle changes and life adjustments by the MI survivor brought on feelings of anger, frustration, and irritability that were further compounded by the spouse’s overprotectiveness (Stewart et al.). This spousal reaction resulted from increased anxiety caused by the spouse’s own emotions of fear, anger, frustration, and resentment about the lifestyle changes and reactions of the MI survivor. Persons with an MI and their spouses believed that health care professionals contributed to some of their stress by not providing adequate information during hospitalization and discharge, as well as by not offering emotional support. This emotional “roller coaster” impacted their ability to interact with each other emotionally and physically and thus affected marital satisfaction (Stewart et al.).

Hilbert (1996) also found that patients with an MI and their spouses had considerable emotional distress. In the study conducted by Hilbert (1996), perceptions of family function and affect of MI patients and their spouses were examined at the time of
hospitalization and 3 months later. A sample of 42 couples (84 participants) was recruited; however, only 37 couples (74 participants) completed the study at both times. These couples completed the Family APGAR instrument, which is a five-item questionnaire that measures the “perceived satisfaction with the functional status of either a nuclear or alternative lifestyle family” (Hilbert, 1996, p. 82). This instrument has “five components of family function: adaptation [family as resource], partnership [communication style], growth [response to change], affection [emotional responses], and resolve [the way time is shared]” (Hilbert, 1996, p. 82). Another instrument completed by these couples was the Affective Balance Scale, which is a “40-item adjective mood scale that measures positive affect states [joy, contentment, vigor, and affection] and negative affect states [anxiety, depression, guilt, and hostility], as well as the balance between them” (Hilbert, 1996, p. 82). From these two measurements, Hilbert (1996) found that patients with an MI and their spouses perceived their families to be highly functional and that both experienced emotional distress during hospitalization and 3 months into the recovery period. Furthermore, spouses exhibited more emotional distress at the 3-month interval than the patients did. Hilbert (1996) found that a possible reason for this difference in emotional distress was the role responsibilities and duties placed on the spouse during the recovery period.

In a previous study, Theobald (1997) found similar stressors in spouses of first-time MI survivors. In a phenomenological study of only 3 participants, Theobald examined the lived experiences of these spouses approximately one month after their partners had experienced an MI. Five major themes were identified: “crushing uncertainty,” “overwhelming emotional turmoil,” “the need for support,” “the lack of
information heightened anxiety,” and “the acceptance of lifestyle changes” (Theobald, pp. 597-598). Some of the same stressors regarding uncertainty, fear, and anxiety were identified within these themes that peaked at different times during the experience. To keep the MI survivor from knowing about these emotions, the spouse would distance himself or herself from the MI survivor and would create a sense of isolation and difficulties in their relationship (Theobald).

Several years later, Kettunen et al. (1999) conducted a quantitative study of 57 spouses of first-time MI survivors (ranging in age from 23 to 83 years, \( M = 57 \) years) 2 weeks to 4 months after the MI had occurred. These authors used three different instruments that they had developed to examine the various fears and symptoms experienced, the predictors of these fears and symptoms, and the support of health care professionals during the crisis. Kettunen et al. found that spouses experience, to some extent, disease-related fears (recovery-related difficulties, another MI, and overprotection) and personal fears (problems with marriage, sexual problems, and losing own resources). These participants also were overprotective and experienced the anxiety of significant others. These spouses most frequently reported symptoms of fatigue, sleeping disturbance, anxiety, tension, and depressive mood. When questioned about support from health care professionals, respondents frequently acknowledged either no support or limited support. Spouses indicating limited support were not satisfied with the sufficiency of the support received from the health care providers. When examining the relationship among fears, symptoms, and support from health care providers, Kettunen et al. determined that fears were more frequently reported as disease-related than as personal; in addition, the older the spouses, the more severe were their worries. A
connection among age, gender, and types of fears (disease related or personal) was demonstrated by the finding that younger female spouses reported more personal fears than disease-related fears. In their investigation of factors affecting symptoms, Kettunen et al. found that the individual’s own health played a role in predicting all types of symptoms. Also, the results indicated that a reduction in the spouse’s own health and dissatisfaction with support from health care providers exacerbated the spouse’s difficulties in managing the survivor’s MI and thus affected the recovery process of the patient.

All of these studies revealed that a cardiac event such as an MI can produce stress for both the survivor and the spouse during the first few weeks to 4 months. The stressor of “fear” was noted in several studies. Although this concept was identified in each of these studies, results from two of them (Kettunen et al., 1999; Stewart et al., 2000) revealed differences in the types of fears, particularly in fears reported by spouses. However, this finding may have been related to the age difference of the participants. As noted by Kettunen et al., younger females exhibited more personal fears such as marriage problems, sexual problems, and losing own resources than disease-related fears such as recovery difficulties, another MI, and overprotection.

Recovering From an MI

After an MI, there is a period referred to as the recovery phase. According to Van Horn, Fleury, and Moore (2002), the recovery phase is known as “the period of rehabilitation after hospital discharge and may include return to usual activities and/or development of lifestyle adaptations” (p. 187). Of the studies reviewed, the authors differed on when to examine the recovery phase (range 3-5 days to 45 months). The
research conducted by most of the authors in this literature review extended from 2-3 weeks to 3-4 months.

For the MI patient and the spouse, the recovery phase can bring on physical, psychological, and emotional challenges. The outcome of these challenges depends upon the way in which the MI survivor and the spouse handle the experience. Research in the past decade has been devoted to examining the recovery process (Beach et al., 1992; Clarke, Walker, & Cuddy, 1996; Figueiras & Weinman, 2003; Johnson & Morse, 1990; Svedlund & Danielson, 2004; Thompson, Ersser, & Webster, 1995). To correct a lack of knowledge in 1990, Johnson and Morse conducted a grounded theory study to examine the process of adjustment for MI patients; the researchers interviewed 14 first-time MI patients (ranging in age from 43 to 72 years; equal representation of men and women) from cardiac rehabilitation programs and cardiac self-help groups at varying times (1 month to 45 months) after their MI. The findings revealed a core category of “regaining control,” which involved three dimensions: predictability (the ability of the person to predict the outcome of an action), self-determination (the ability of the person to make informed decisions), and independence (the ability of the person to act on decisions). Furthermore, Johnson and Morse identified four stages in the struggle to regain control. The first stage (“defending oneself”) occurs during the period of acute illness and involves the task of maintaining a sense of control. During the second stage (“coming to terms”), patients attempt to come to terms with the situation by struggling with their perceived loss of control. The length of this stage is usually 3 to 8 days after an MI. Within this stage, patients face their mortality, attempt to make sense of the occurrence, face their limitations, and begin to look to the future (in either an optimistic or a
pessimistic way). The third stage (“learning to live”) involves the struggle to reestablish a sense of control. There is a reciprocal relation between this stage and Stage 2; therefore, the outcome of this stage is affected by the outcome of Stage 2. This stage also has three phases: preserving a sense of self (finding their confidence and self-worth and maintaining some independence), minimizing uncertainty (seeking reassurance, learning about their health, and practicing cautiousness), and establishing guidelines for living (testing their limitations, learning to read their bodies, and modifying their lifestyles). The final stage (“living again”) is achieved only if patients are able to develop a sense of control (accepting limitations, refocusing, and attaining mastery). If they do not do so, then they abandon their struggle and remain in an invalid role (Johnson & Morse, pp. 128-134).

Although the findings from the Johnson and Morse (1990) study contributed much to the awareness about the process of adjustment after an MI, the location at which participants were chosen and the varying interview times within the recovery process may have imposed limitations on the study. The participants within this study (Johnson and Morse) were purposively selected from a cardiac rehabilitation program and a cardiac self-help group, which may have affected their process of adjustment. Also, there were such variations in the timing of the post-MI interviews that the perception of the adjustment process could have been affected; furthermore, other crises, complications, or illnesses could have altered the process.

Beach et al. (1992) conducted a longitudinal, descriptive (correlational) study with 17 married couples, one of whom had experienced a first-time MI. The mean age of the patients was 52 years, they were predominately male, and all were White. Little
demographic information was available about the spouses (14 women and 3 men, all Caucasian). Data were collected at four intervals throughout a 6-month period with the use of the Social Support Inventory, a 55-item self-administered questionnaire employed to examine emotional support, esteem support, network support, appraisal support, and altruistic support; the Family Inventory of Life Events Scale, “a response of ‘yes’ or ‘no’ to 71 items representing stressful life events and changes experienced by a family unit” (Beach et al., p. 32); and Spanier’s Dyadic Adjustment Scale, a 32-item test employed to measure marital satisfaction with a 5-point scale for 30 of the items and a “yes” or “no” response for 2 of the items. The comfort of sexual activity (hugging, foreplay, gentle intercourse, and vigorous intercourse) was measured by an instrument developed by the primary researcher (Beach et al.), who incorporated a 5-point scale (1, extremely comfortable, to 5, extremely uncomfortable). Respondents were asked to indicate their frequency of sexual activity before and after the MI in a measurement tool that incorporated a 3-point scale and was developed by the primary researcher of this study (Beach et al.). Last, respondents were asked to complete the Myocardial Infarction Recovery Index, an instrument with seven indicators of recovery, each ranging from 10 to 20 points, with a maximum score of 85 points for a recovering patient. The assessment included sexual activity, self-perception of recovery, angina, return to work or other activities, absence of subsequent MI, absence of subsequent emergency department visits, and absence of hospitalizations related to coronary difficulties. The following results were found. First, there was no relationship between social support and recovery. Second, there was a significant positive relationship between the number and intensity of stressful life events and recovery at the 3-month and 6-month periods. Third, marital satisfaction
was significantly related to the patient’s recovery during the first 3 weeks after discharge but not at 3 months and 6 months. This finding resulted from the lack of variation in scores at 3 and 6 months. Last, there was a significant positive relationship between sexual activity and recovery, possibly because these spouses indicated a high sexual comfort during the first 3 weeks and at 3 months. The limitations in the findings of this study (Beach et al.) relate to the low number of participants, the lack of equal gender and ethnicity representation, and the use of several scales that were developed by the primary researcher without reliability and validity tests.

As indicated in a previous study by Johnson and Morse (1990), preserving a sense of self can be affected by a patient’s perception of overprotectiveness by a family member and particularly by the spouse. Clarke et al. (1996) examined this concept of overprotectiveness in a study that consisted of testing first-time MI patients and their wives at two different intervals, 3 to 5 days and 3 months, after the actual event. Both semistructured interviews and questionnaires were used as methods of measurement. Questionnaires employed were the Influential Relationships Questionnaire, a 34-item scale developed to measure “interpersonal characteristics of care, overprotectiveness, and criticism perceived in significant and influential relationships” (Clarke et al., p. 373); the Family APGAR, an instrument involving five closed-ended questions used to measure family functioning; the Self-Efficacy Scale, a measure consisting of “12 subscales each describing different levels of abilities to perform common activities that may stress the heart” (Clarke et al., p. 373); the Zung Depression Scale, a 20-item scale designed to assess depression; the Zung Anxiety Status Inventory, a 20-item scale used to measure anxiety by assessing both affective and somatic symptoms; the Psychosocial Adaptation
to Illness Scale, a 46-item scale used to examine psychosocial adjustment to illness in the primary domains of “health care orientation, vocational environment, domestic environment, sexual relationships, extended family relationships, social environment, and psychological distress” (Clarke et al., p. 374); the Specific Activity Scale, an instrument consisting of five main categories used “to assess the degree of functional cardiovascular disability” (Clarke et al., p. 374); and the Peel Prognostic Index, a measure used to “determine the severity of an MI from certain factors such as age, sex, previous history, degree and severity of shock, presence and severity of heart failure” (Clarke et al., p. 374). The findings from Clarke et al.’s study revealed that, although perceived overprotectiveness did not correlate with cardiac functional capacity (physical abilities), it was positively correlated with psychological distress such as depression and anxiety and negatively correlated with quality of life. However, the scores from the depression scale revealed that both those patients who perceived overprotectiveness and those patients who did not perceive overprotectiveness, as well as their wives, exhibited some problems with depression and anxiety. As noted in Clarke et al.’s report, the instrument used to measure overprotectivity was scored by only the patient and not the wife; therefore, those patients who were emotionally distressed could have been “reacting negatively to behaviors that others might not have perceived as overprotective” (p. 376). Also, patients may not have been satisfied with their marital relationship, and this dissatisfaction could have resulted in these perceptions’ being “colored” (Clarke et al., p. 376).

In a recent study by Svedlund and Danielson (2004), the concept of protecting the partner emerged from data collected in this phenomenological study that attempted to
capture the lived experiences in daily life after an acute MI for nine afflicted women (ranging in age from 47 to 57 years) and their male partners. Data collection took place at 3 months and 12 months through separate interviews of the women and their partners. Thirty-six interviews were collected (34 on audiotapes and 2 through written notes by one of the authors), with each lasting 25-80 min. In the interpretation, data gathered from both 3 months and 12 months were combined because no variations were revealed between the two intervals. Two primary themes emerged, with subthemes noted of each one. The first theme identified by Svedlund and Danielson was “living in a changed life situation” (p. 440), which contained the subthemes of “showing consideration,” “taking responsibility,” “living side by side,” and “desiring what to do” (p. 440). In summary, this theme indicated that the women struggled to live a life as normal as possible and often would not share their concerns, worries, and even physical symptoms with their partners for fear of worrying them and promoting the partner to engage in overprotective behavior, a feeling commonly reported by the person with an MI. The second theme that Svedlund and Danielson identified was “looking to the future” (p. 440), which contained the subthemes of “feeling uncertain,” “feeling powerless,” “feeling limited,” and “feeling hope” (p. 443). The afflicted women and their partners believed in or had hope for a future; however, there were uncertainties and insecurities about what the future would bring (wellness and happiness or illness and unhappiness). These uncertainties further led to feelings of powerlessness because the women were limited in their activities of daily living. The feeling of hope and closeness experienced by some of the partners may have been precipitated by having survived the situation or, in another sense, by having been given a second chance. Therefore, “life took on a new dimension because they became
more conscious of the values and meaning of life” (Svedlund & Danielson, p. 444). It would be interesting to know whether similar themes would have emerged if the afflicted individuals had been men with female partners. Interestingly, this study (Svedlund & Danielson) included 1 participant who had had a second-time MI.

Although these studies provided some insight into the recovery process for MI patients and their spouses, there were differences in the ways in which individuals and family members responded to the crisis. These discrepancies appeared to have originated from the variations in data collection procedures, as well as from the individuals and family members being studied. Therefore, future research involving the recovery process should remain within the boundaries of a contextual definition (such as the one presented herein) but should incorporate the understanding that the individuals within the study give the actual meaning to the recovery phase.

Coping With an MI

The literature revealed that persons with an MI and their spouses used diverse strategies that were emotion focused, problem focused, and relationship focused to cope with the stressors identified. For instance, in the study by Stewart et al. (2000), an emotion-focused strategy that included seeking social support from family and friends and seeking spiritual support from God, as well as including positive reappraisal, was found to be the most commonly used coping method for persons with an MI and their spouses. An earlier study by Theobald (1997) found that the spouses of MI survivors used similar strategies. This form of strategy was also noted later in a study by Santavirta, Kettunen, and Solovieva (2001), who examined the coping strategies of 57 spouses of first-time MI survivors 2 weeks to 4 months after the incident by using Folkman and
Lazarus’s Ways of Coping Questionnaire (66 coping strategies divided into eight coping subscales indicating patterns of coping behaviors). Santavirta et al. found that “positive reappraisal and seeking social support followed by confrontive coping were strategies most frequently used by these spouses” (p. 38); they also found that the method of positive reappraisal was significantly related to the physical strain, psychological strain, and personal fears of these spouses. In addition, Santavirta et al. noted a strong negative relationship of these coping strategies, particularly that of social support, with age. In other words, the older spouses did not apply these strategies as much as the younger spouses did. An explanation given by Santavirta et al. was that older spouses possibly were more passive about the situation and thus did not manifest much tension.

Another strategy, problem-focused coping, was found to be used by persons with an MI and their spouses. Informational support provided by health care providers, physicians, and nurses was used typically as a problem-focused coping strategy (Stewart et al., 2000; Theobald, 1997). Santavirta et al. (2001) noted that “confrontative coping” (p. 37) and “planful problem solving” (p. 38) were also used. Santavirta et al. also found that planful problem solving was used more in the immediate crisis than further along in the recovery process.

The final coping strategy, identified only by Stewart et al. (2000), was relationship focused, which was denoted as “active engagement” (p. 1356) or “mutual problem solving and communication” (p. 1356). Persons with an MI and their spouses indicated that communication was a vital component to effective coping; therefore, the inability to communicate with each other was “a major source of relationship difficulties and subsequent stress” (Stewart et al., p. 1356).
As evidenced in these research studies, various coping strategies, particularly those emotion focused, assist MI survivors and, in particular, their spouses. Therefore, the provision of emotional support is essential. Some of these emotional support needs of reassurance, hope, acceptance, and comfort may come from family, friends, and health care providers, as well as from spiritual resources. However, there has been little research done on spirituality specific to persons with an MI and their spouses.

Spirituality for Persons With Chronic or Acute Illness and Their Spouses

_A spirituality in Illness_

A plethora of research on the conceptualization of spirituality has focused on examining spirituality for terminally and chronically ill care recipients and caregivers (Albaugh, 2003; Clark & Heidenreich, 1995; Kaye & Robinson, 1994; Miller, 1989, 1991; Narayanasamy, 2002; O’Malley & Menke, 1988; Rippentrop, Altmaier, & Burns, 2006; Theis, Biordi, Coeling, Nalepka, & Miller, 2003). To establish the basis of this research, I have included both theoretical and empirical studies in the following literature review. Because of the limited amount of research on acute illness, the literature review includes research on spirituality from the perspective of both acute and chronic illness, as well as including studies recognizing the importance of exploring spirituality from the perspective of the person with an MI, as well as from that of the spouse.

_Spirituality as Coping_

Many studies have revealed spirituality as a coping mechanism used by patients and their spouse to deal with chronic illness. For instance, Narayanasamy (2002) conducted a descriptive phenomenological study with 15 chronically ill participants who varied in age, gender, religion, and medical diagnosis. These participants were asked to
describe their experiences with the chronic illness and their ability to cope since receiving the medical diagnosis. The findings revealed several emerging themes: reaching out to God in the belief and faith that help will be forthcoming (an inner awareness of a presence), feeling connected to God through prayer (regarded as a private and personal resource), searching for the meaning and purpose of life and of the illness, adopting a strategy of privacy (a reluctance to proclaim religious beliefs and faith), and feeling connected with others (support of family and friends). In a phenomenological study conducted by Albaugh (2003), 7 participants (five women and two men, aged 44 to 74 years) were interviewed about their experience of living with various life-threatening illnesses. The following themes emerged from participants’ descriptions of their illness and their ability to manage their situations: a sense of comfort, which was attained from their spiritual beliefs and from support by other spiritual individuals; trust in God, which provided a willingness to accept either restoration of their health or death; strength, which was attained through their devotion to reading scriptures, praying, and singing inspirational songs; feelings of blessings, which described life as a gift; and the finding of meaning, which served as a “wake-up call” to be aware of the important aspects of life and to make the most of the time available (Albaugh, pp. 595-596).

Individuals who assumed the role of caregiver identified some of the same ways of handling the illness situation. In a descriptive pilot study of 17 caregiver wives of patients with dementia and 23 noncaregiving wives of healthy adults, Kaye and Robinson (1994) measured the spiritual perception (spiritual views and interaction) of these two groups by administering the Spiritual Perspective Scale. This 10-item instrument measured “participants’ perspective of the extent to which certain spiritual views were
held and spiritually-related interactions were used” (Kaye & Robinson, p. 219). The scores revealed spirituality to be an aid in coping for both groups; however, caregiver wives obtained higher scores. These scores were higher because more caregivers discussed spiritual matters with friends and family on a weekly basis and engaged in daily reading of spiritually related material, as well as in daily praying. In other words, they more often expressed spiritual behaviors, spiritual beliefs, and spiritual guidance, possibly because the stresses of caregiving force individuals to seek methods of coping that utilize both internal and external resources. For these caregivers, those resources were prayer, spiritual readings, and forgiveness. Theis et al. (2003) noted similar forms of coping in their qualitative study that consisted of 60 caregivers (ranging in age from 52 to 98 years) and 60 care recipients (ranging in age from 24 to 84 years of age, mostly over 65 years of age), with an equal ethnic representation of Caucasians and African Americans. Responses to a semistructured interview conducted to determine how caregivers and care receivers used respite as a form of self-care yielded the following themes (Theis et al.): (a) coping as a “formal religion” (church services, scripture reading, prayer; p. 51) and as “social support from religion-related groups” (church members and religious social clubs; p. 52) and (b) meaning (positive attitude, retribution or reward, all encompassing; pp. 52-53). These spiritual resources provided a way for the caregiver and care receiver to handle the situation.

**Spirituality as Hope**

In the research literature, the concept of hope emerged as an element of spirituality for acutely ill patients and their spouses. For example, O’Malley and Menke (1988) examined the relationship between perceived stress and the critically ill patient’s
perception of hope. Each of 7 (five males and two females) first-time MI participants between the ages of 40 and 70 years who were 4 to 7 days past the initial crisis completed the Hospital Stress Rating Scale and the Hopelessness Scale. Upon analyzing the participants’ responses, O’Malley and Menke found unfamiliar surroundings and separation from spouse to receive the highest percentage of perceived stress. This finding may have resulted from the fact that these participants were hospitalized in the critical care unit, which creates an environment that is isolated and produces a great amount of separation from the family because of restricted visitation hours. O’Malley and Menke found these participants to be generally “hopeful and motivated about the future, but uncertain in regard to future expectancies” (p. 188) and were unable to find any statistical significance in the relationship between stress and hope, most likely because of the small sample size.

In a qualitative study conducted by Miller (1989), the concept of hope and the ability of the acutely ill cardiac patient to sustain hope when confronted with adversity were examined. Sixty critically ill persons (heart surgery and MIs) between the ages of 38 and 83 years ($M = 58.47$ years) were interviewed with the use of a 20-item semistructured interview guide 2 to 4 days after being transferred to an intermediate care unit. From these responses, nine categories of hope-inspiring strategies and three threats to hope were identified. The hope-inspiring strategies were (a) cognitive strategies (the use of thought processes such as denial to change threatening perceptions), (b) determinism (having a conviction of a positive outcome), (c) world view (life is filled with meaning and growth that come from crises), (d) spiritual strategies (the ability to overcome suffering by having a relationship with God), (e) relationships with caregivers
(a relationship with health care providers that conveys positive expectations, ability to handle the stresses, and confidence in the treatment plan), (f) family bonds (a sustaining relationship that gives the individual a will to live and that shares in the difficult situation), (g) control (knowing and understanding what was happening in their illness progress), (h) goals (establishing desired outcomes and attaining them), and (i) miscellaneous strategies (the use of distraction and humor). The three threats to hope that were identified by these participants were as follows: receiving physical cues and evidence of setbacks (recurrent complications from the heart illness or being given a diagnosis of some other illness within the past year and knowing other persons who died from the same illness), feeling that no one cares (lack of family support through physical presence and a positive outlook), and having negative hospital experiences (being in the hospital for too long and having health care workers with very negative attitudes). The aforementioned hope-inspiring categories acknowledge the element of hope as an intrinsic part of coping. Therefore, to sustain hope and reduce threats to its existence, health care providers must promote a therapeutic interaction with the patient and encourage the patient to bond with the family, be in control of the situation, and attain goals.

Clark and Heidenreich (1995) reported similar findings during their research endeavors to understand hope as part of spiritual care. In this descriptive study of 63 patients (33 male and 30 female; ranging from 18 to 76 years and critically ill from various health problems) were interviewed 1 to 2 days after discharge from the critical care unit. The structured, open-ended interview (which contained only three primary questions) obtained data regarding the patient’s perceptions of hope. Results of the study
revealed that critically ill patients describe their perception of hope as including the presence of and support by the nurse, family, and relatives, as well as the establishment of trust between the patient and nurse in providing high-quality care. As in the two previous studies (Miller, 1989; O’Malley & Menke, 1988), this research by Clark and Heidenreich supports the need for the nurse to be a facilitator among family, clergy, and health care workers. Furthermore, because these participants were interviewed during the critical phase of their illness and because the health status and environmental factors of the individual will change during the recovery process, further investigation is warranted.

Spouses of acutely ill patients have also identified the element of hope. Miller (1991) conducted a descriptive study on the element of hope, with a focus on identifying components that helped critically ill family members maintain hope. The conclusions reached by Miller (1991) indicated that hope could be maintained through a reciprocal relationship with spouse, family, and/or friends, as well as with health care professionals. Furthermore, this reciprocal relationship among the critically ill patient, spouse, and health care professional created spiritual bonds that allowed each individual to become more physically, emotionally, and psychologically well adjusted (Miller, 1991).

Because only the element of hope was examined in them, these studies (Clark & Heidenreich, 1995; Miller, 1989, 1991; O’Malley & Menke, 1988) lacked the ability to represent a more holistic perspective of spirituality. Furthermore, although Miller (1991) did acknowledge that spiritual well-being was enhanced by a reciprocal relationship, there was little discussion about how this reciprocity affects the well-being of patient and spouse.
**Spiritual Well-Being**

A relationship between spiritual well-being and health outcomes or health-promoting behaviors for those suffering chronic illness has been acknowledged in several studies during the last several years (Landis, 1996; Mackenzie et al., 2000; McNulty et al., 2004; Morris, 2001; Waite et al., 1999). In a recent examination of the relationship between spirituality and coronary heart disease, Morris conducted a correlational study to examine spiritual well-being with progression or regression of coronary heart disease as measured with computerized cardiac catheterization data. The Morris study consisted of 14 participants (8 in the experimental group, who participated in meditation and relaxation methods, and 6 in the control group) from a previous study known as the Lifestyle Heart Trial. The participants were administered the Spiritual Orientation Inventory, a measurement of their spiritual well-being. The scores on this instrument indicated a significant correlation with the extent of progression or regression of coronary heart disease as documented from the cardiac catheterization data. Participants with low scores for spiritual well-being tended to have progression of their disease, and those participants with high scores for spiritual well-being demonstrated regression of their coronary obstruction (Morris). In a previous study, Waite et al. examined the correlation of spiritual health behaviors with health-promoting behaviors among 208 employees of a large home fitness equipment company. Each participant completed the Health-Promoting Life-Style Profile II Scale. This scale consists of six subscales: “spiritual growth, health responsibility, physical activity [exercise], nutrition, interpersonal relations, and stress management” (Waite et al., p. 159). Waite et al. divided the subscales into spiritual health behaviors (spiritual growth, health responsibility, and interpersonal...
relations) and health-promoting behaviors (physical activity, nutrition, and stress management). An additional nonsmoking subscale that included only one item was added to the entire questionnaire. The results yielded a moderate-to-strong positive relationship in the composite scores between spiritual health behaviors and health-promoting behaviors. In other words, when the scores of spiritual health behaviors were high, then the health-promoting behaviors were high. Spiritual beliefs and practices apparently have some influence on a health-promoting lifestyle and should be considered in health wellness programs as a way of enhancing both the spiritual health and the physical health of individuals (Waite et al.). These two studies (Morris; Waite et al.) may have imposed biased responses from the participants. In the study by Morris, participants were recruited from a sample enrolled in a study done approximately 10 years previously, and the results of their cardiac catheterization were known. The participants in the study by Waite et al. may have responded in a certain way because of concerns about their employment.

Landis (1996) also examined spiritual well-being; however, this author focused on the concepts of uncertainty and psychosocial adjustment among 94 participants with Type I or Type II diabetes mellitus. The results revealed that spiritual well-being increased when psychosocial adjustment increased and when uncertainty decreased. Similar results were found in a study conducted by McNulty et al. (2004). Fifty participants diagnosed with multiple sclerosis were examined for a relationship among perceived uncertainty, spiritual well-being, and psychosocial adjustment. Spiritual well-being influenced psychosocial adjustment, and this influence alleviated the impact of uncertainty on adaptation for the population with multiple sclerosis. Mackenzie et al. (2000) “explored how and why religious belief and activity supported psychological
well-being in older adults” (p. 37). In a qualitative study (according to Mackenzie et al., a combination of phenomenology and grounded theory) that involved utilizing focus groups and interviews, 41 individuals (ages ranging from 66 to 92 years; predominately White and female) participated for a 6-month period in 7 focus groups and 10 individual interviews. Several categories emerged from the data collected: (a) religious belief fosters a feeling of receiving spiritual support (these older adults knew that a Higher Power cared for them, had control over the situation, worked through those individuals providing care, and provided a sense of purpose in life; acknowledged that service to God and other people is a duty; and were aware of God’s presence in certain situations; (b) prayer is experienced as linking the mundane world with a Higher Power (allows the transfer of burdens and healing according to “God’s” will); and (c) religion, spirituality, and health interact in important ways (these older individuals knew that religion and spirituality are very distinct concepts but felt that it was not necessary to have both to affect physical well-being). Many of these participants received psychological comfort from knowing that a Higher Power is in control and that prayer is a communication tool that provides social support. They felt that, if they used positive thinking, optimism, and a calm mental state, psychological health outcomes would be good. In a correlation study by Rippentrop et al. (2006), 61 patients with cancer were administered instruments to measure quality of life, spirituality, and religiosity. The concept of quality of life was measured by the Functional Assessment of Cancer Therapy Scale General, which is a 27-item questionnaire used to assess quality of life in the “domains of physical, functional, social, and emotional well being” (Rippentrop et al., p. 32). Spirituality was measured by the Functional Assessment of Chronic Illness Therapy Spiritual Well-Being, which is a 12-
item scale that includes components such as “a sense of meaning in one’s life, harmony, peacefulness, and a sense of strength and comfort” (Rippentrop et al., p. 32). The Duke Religion Index was used to assess the concept of religiosity. This index consists of 5 items that measure the “intrinsic and extrinsic aspects of organizational and nonorganizational dimensions of religious practice” (Rippentrop et al., p. 33). The findings from this study revealed that spirituality has a “stronger relationship with quality of life than religiosity” (Rippentrop et al., p. 31). In other words, these participants’ quality of life was affected by both spirituality and religiosity; however, it was their spiritual life that contributed to their overall well-being.

A different approach to the investigation of spirituality was taken by Forbes (1994), who examined “the relationship in the perception of spirituality between the care recipient and caregiver and the influence this may have on their emotional well-being and ability to cope with a chronic illness” (p. 297). In a sample of 17 care recipients and 17 caregivers (ranging in age from 73 to 82 years; predominately female; with a representation of Whites, 53%, and Blacks, 47%, as well as of various religious and nonreligious groups), two forms of measurement were utilized to collect data: the Spiritual Well-Being Scale and the Spiritual Assessment Questionnaire. The Spiritual Well-Being Scale, a 20-item 6-point Likert-type scale, measured the participant’s “relationship with God on the Religious Well-Being subscale and satisfaction with life on the Existential Well-Being subscale” (Forbes, p. 300). The Spiritual Assessment Questionnaire was an interview guide consisting of 10 open-ended questions designed “to survey the attitudes of the care recipients and caregivers about the components of God, spirituality, illness, and prayer” (Forbes, p. 300). The results of this particular study
revealed a correlation between the caregiver’s spiritual well-being and the caregiver’s perception of the care recipient’s spiritual well-being. In other words, a “spiritual bonding” (Forbes, p. 301) occurred that brought about psychological adjustment, mental health, and an increased self-esteem for both the care recipient and the caregiver.

These studies (Forbes, 1994; Landis, 1996; Mackenzie et al., 2000; McNulty et al., 2004; Rippentrop et al., 2006) provided insight into the psychological and spiritual well-being of individuals. Little exploration into the individual’s concept of the meaning and purpose of life was provided. However, Walton (1999), in her grounded theory study with 13 participants (ranging in age from 41 to 79 years and consisting predominately of men of various religious and nonreligious orientations), discovered that meaning and purpose were a “vital process in the spirituality of participants during and after a heart attack” (p. 45). In addition, other supportive categories emerged: developing faith and giving the gift of self. All three of these categories permeated the most influential element of receiving presence, which included God, nature, friends, family, community, and health care providers. Toth (1992) also examined the effects of spiritual support during hospitalization and/or recovery by using the Spiritual View Assessment to measure spiritual support perceived by 9 acute-MI patients 2 weeks after discharge. The findings from this study indicated that addressing spiritual views for the patient at the time of hospital discharge, as well as during early recovery at home, made the patients feel better and decreased the amount of stress that they were experiencing from having an MI.

The findings in these various qualitative and quantitative studies indicate that spirituality was perceived by participants as a coping strategy with which to handle the
daily living of various situations and illnesses. As a result, a state of spiritual well-being emerged that promoted an overall sense of well-being (physical, mental, emotional), both for the individual with the illness and for the caregiver. Interestingly, all but one of these studies focused on the patient’s spirituality despite the fact that, as noted by Toth (1992), family played a role in enhancing spirituality and thereby influenced recovery.

*Spiritual Development*

Literature was reviewed to examine the effects of characteristics such as age, gender, ethnicity, and religion on the spiritual well-being of individuals. Two studies, one conducted by Isais, Parker, and Murrow (1999) and the other by Heintz and Baruss (2001), both focused on the spiritual well-being of various age groups. Heintz and Baruss compared the relationship between late adulthood and spirituality with that reported by the young adults who were used to refine the measurement. For this study, 30 participants who ranged in age from 60 to 90 years (22 women, 8 men) were recruited and given the Expressions of Spirituality Inventory, which consists of five spiritual dimensions: Cognitive Orientation Towards Spirituality, Experiential/Phenomenological Dimensions of Spirituality, Existential Well-being, Paranormal Beliefs, and Religiousness. The results supported the contentions of Heintz and Baruss that those in later adulthood are more religious and less anxious when speaking about death than those in young adulthood. Isais et al. investigated the relationship between spiritual well-being and age in two age groups in later adulthood (56 to 74 years and 75 years or more), as well as the gender, ethnicity, and religious affiliations of these groups and found that the age category had no effect on spiritual well-being but did affect the numbers of individuals who were of a religious affiliation. Results from both studies (Heintz & Baruss; Isais et al.) revealed that
the older population was more aware of their spirituality. In addition, Isais et al. found that White, Protestant women had a stronger sense of spiritual well-being than African American women did.

In summary, the physical, emotional, and psychological stress from an MI brings about various needs and coping strategies for handling the acute crisis, as well as the rehabilitation phase. Although spirituality has been studied extensively in many different populations with chronic illness, very little research on spirituality has been devoted to acutely ill persons in the recovery process, as well as their spouses/partners. Furthermore, no research was found to examine spirituality from a dyadic perspective for acutely ill persons in the recovery process. As this literature review illustrated, spirituality can be conceptualized and operationalized differently, primarily because the concept is so multidimensional. If health care providers understand the meaning of spirituality and its role for persons with an MI and their spouses/partners during the recovery process, these providers might acknowledge and demonstrate spiritual care.
CHAPTER 3

METHOD

Research Design

This qualitative study involved the use of an interpretative phenomenological approach in which semistructured interviews and field note observations were used to explore the meaning of spirituality in acute-MI patients and their spouses/partners after hospitalization. A person with an acute MI was defined as an individual who had experienced a first occurrence of an MI. Spouse/Partner was defined as an individual who had made a commitment by living in the household and who had verbalized for at least 2 years the role of spouse/partner of the person who had an MI.

This approach provided an understanding of meaning by describing and interpreting the participant’s account. The interpretation within this method supplements the descriptive approach by seeking to understand that which may not be immediately apparent; interpretation makes the meaning clearer. As Polkinghorne (1983) noted, “Descriptive and hermeneutic methods supplement each other, the first focusing beneath the surface of individual events in order to describe patterns, the second focusing on the linguistic and non-linguistic actions in order to penetrate the meaning of these events” (p. 214).

“Phenomenology is the kind of thinking which guides us back from theoretical abstractions to the reality of lived experience” (van Manen, 1990, p. 24). In general, phenomenology describes the way in which people orient themselves to lived experience,
and hermeneutics describes the way in which people interpret the texts of life. Therefore, interpretative phenomenology is considered a human-science method. Human science aims at describing and interpreting the meaning of human phenomena, such as through literary and historical studies of texts, and at understanding the lived structures of meaning, such as through phenomenological studies of the life world (van Manen).

Interpretative phenomenology research is a search for the fullness of living, for what it means to be human. “As we research the possible meaning structures of our lived experiences, we come to a fuller grasp of what it means to be in the world” (van Manen, 1990, p. 12). According to Oiler (1982), people are connected to the world through their knowledge about it. We become more knowledgeable about the world through our experiences in the world.

Researching the lived experience deepens the understanding of the nature of everyday lived experience for persons with an MI and for their spouses/partners. Through the description of the essences or the nature of the experience, the meaning and significance of spirituality during an acute illness or crisis are revealed in a fuller, deeper way. By searching and engaging with the MI person and the spouse/partner to determine what being human means to them, the researcher illuminates the meaning of the experience in a more thoughtful, caring way. This method of interpretative phenomenology facilitated in capturing and illuminating a fuller awareness of spirituality for these acutely ill persons and their spouses/partners by seeking to describe and understand this concept as it was lived by them. This fuller awareness was pursued as a way of promoting or enhancing the delivery of spiritual care by health care professionals to these persons with an MI and to their spouses/partners.
Participant Recruitment

Initially, a request letter was drafted and distributed to the physician and nurse practitioners of two local rural clinics specializing in cardiovascular care within the state of Mississippi to seek support for entry into their facilities to recruit participants for this study (see Appendix A). Once support from the facilities was obtained (see Appendix B), the protocol was submitted to the Institutional Review Board for Human Use (IRB) for the University of Alabama at Birmingham for approval (see Appendix C). After IRB approval was secured, the nurse practitioners within these clinics were personally visited to further explain the study and seek their assistance in recruiting participants in the study. Nurse practitioners from each facility informed potential participants (persons with an MI) about the study and gained written consent for me to contact interested individuals (see Appendix D). I maintained weekly contact with the nurse practitioners in these facilities to obtain the written consents and made phone calls to potential participant couples at designated times to inquire about their eligibility for and interest in participating in the study. Once participant couples were determined eligible and agreed to participate in the study, a convenient interview time and location were established.

Over a 19-month period, there were many challenges in recruiting and scheduling initial interviews within the 3-to-4 week time frame. Therefore, three project revision/amendment forms with required documents were submitted at various intervals (5 months, 10 months, and 16 months) to the IRB for the University of Alabama at Birmingham for approval to extend the initial interview period to 6 weeks and to include two more cardiovascular clinics, as well as area churches (see Appendices A, B, C, E, F). These project revisions/amendments were sought to increase the number of female
participants and the number of participants with different ethnicities. The addition of the other two cardiovascular clinics provided the opportunity to recruit 11 participant couples of various ethnicities but lacked gender (female) representation. The final project revision/amendment approval at the area churches yielded recruitment of the last 2 participant couples for this study.

**Sample**

Purposive sampling obtained by using a technique of maximum variation sampling was utilized to recruit persons with an MI. A purposive sample allowed me to select participants on the basis of my knowledge about the population. Furthermore, this type of sampling allowed me to select the widest possible variety of participants who were judged to be typical of the target population (Polit & Hungler, 1999). Purposive sampling ensured that factors such as age, gender, and ethnicity were represented among persons with an MI and thus among their spouses/partners (Sandelowski, 2000). The inclusion criteria for the person with an MI were as follows: (a) The potential participant must have had a first-occurrence MI diagnosed within 6 weeks of the initial interview. This criterion allowed me to examine a crisis during the acute recovery phase and to eliminate any possibility that previous MIs might alter this experience. (b) The person must be able to speak English. (c) The person must be able to comprehend and understand interview questions. (d) The potential participant must be at least 19 years of age. (e) The spouse/partner must be willing to participate. The exclusion criteria for the person with an MI are given here: (a) The person had been diagnosed with more than one MI. (b) The person reported physical complications caused by the MI, such as chest pain and shortness of breath, during the first physician visit after the MI or during the
interview. Because data were gathered during the acute recovery phase of an illness, this criterion ensured that the physical safety of the person with an MI was considered. (c) The potential enrollee was less than 19 years of age. (d) The spouse/partner did not agree to participate. The inclusion criteria for the spouse/partner of the person with an MI were as follows: (a) The potential participant must be at least 19 years of age, (b) the potential participant must be able to speak English, (c) the potential participant must be able to comprehend and understand interview questions, and (d) the person with an MI must be willing to participate. The exclusion criteria for the spouse/partner of a person with an MI were as follows: (a) the potential participant was less than 19 years of age, (b) the potential participant was unable to speak English, (c) the potential participant was unable to comprehend and understand interview questions, and (d) the person with an MI did not agree to participate. The inclusion criterion for both the spouse/partner and the person with an MI was a commitment to each other for a minimum of 2 years. The exclusion criterion for both the spouse/partner and the person with an MI was a commitment to each other for less than 2 years.

Tables 1 and 2 present the proposed number of participants for this study; however, the demographics of the sample of participants changed during the course of the research because recruitment efforts posed many challenges. These proposed numbers had been selected after consideration of a report from the National Heart, Lung, and Blood Institute (2004). According to this document, the prevalence of an acute MI is higher in males than in females at all ages and is greater in both Blacks and Whites than in any other ethnic group (National Heart, Lung, and Blood Institute).
Although 27 persons with an MI were recruited, only 24 participant couples were screened because not enough information was provided to enable me to make telephone contact with 3 of the participant couples. Of the 24 participant couples screened, only 13 participant couples, or 26 individual participants, were entered into the study. The other 11 participant couples were excluded from the study either because one member of the couple refused to participate or because complications from the MI occurred that resulted in hospitalization or death. Tables 3 and 4 display the demographics for the participant couples. Within these tables, participants were assigned pseudonyms to maintain anonymity and were listed in chronological order of their recruitment.

The demographic data in Table 3 for persons with an MI can be summarized as follows: Four (31%) female and 9 (69%) male; 6 (46%) African American and 7 (54%) Caucasian; age ranging from 26 to 79 years ($M = 50$ years); 9 (69%) Baptist, 2 (15%) Apostolic, 1 (8%) Catholic, and 1 (8%) no religious affiliation identified; 8 (62%) with a high school education or less, 4 (31%) with 4 years of college, and 1 (7%) with a
Table 3

Demographics of Persons With a Myocardial Infarction (MI; n = 13) and Their Spouses/Partners (n = 13)

<table>
<thead>
<tr>
<th>Individuals</th>
<th>Gender</th>
<th>Ethnic</th>
<th>Age</th>
<th>Religion</th>
<th>Education level</th>
<th>Prognosis of MI</th>
<th>Physical problems from MI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Betty/ Fred</td>
<td>F/M</td>
<td>C/AA</td>
<td>58</td>
<td>Baptist</td>
<td>HS</td>
<td>NI</td>
<td>No</td>
</tr>
<tr>
<td>Anthony/ Natalie</td>
<td>M/F</td>
<td>AA</td>
<td>26</td>
<td>NI</td>
<td>HS</td>
<td>Good</td>
<td>No</td>
</tr>
<tr>
<td>George/ Jessica</td>
<td>M/F</td>
<td>AA</td>
<td>33</td>
<td>Apostolic</td>
<td>HS</td>
<td>NI</td>
<td>Yes</td>
</tr>
<tr>
<td>Joshua/ Frances</td>
<td>M/F</td>
<td>AA</td>
<td>51</td>
<td>Baptist</td>
<td>HS</td>
<td>Poor</td>
<td>No</td>
</tr>
<tr>
<td>Phillip/ Tamarin</td>
<td>M/F</td>
<td>AA</td>
<td>51</td>
<td>Baptist</td>
<td>HS</td>
<td>Fair</td>
<td>No</td>
</tr>
<tr>
<td>Marvin/ Stella</td>
<td>M/F</td>
<td>AA</td>
<td>63</td>
<td>Apostolic</td>
<td>HS</td>
<td>Fair</td>
<td>Yes</td>
</tr>
<tr>
<td>Aaron/ Ruth</td>
<td>M/F</td>
<td>C</td>
<td>55</td>
<td>Baptist</td>
<td>HS</td>
<td>Fair</td>
<td>Yes</td>
</tr>
<tr>
<td>Jean/ Sam</td>
<td>F/M</td>
<td>AA</td>
<td>36</td>
<td>Baptist</td>
<td>College</td>
<td>Poor</td>
<td>No</td>
</tr>
<tr>
<td>Mitch/ Sarah</td>
<td>M/F</td>
<td>C</td>
<td>51</td>
<td>Baptist</td>
<td>College</td>
<td>Good</td>
<td>No</td>
</tr>
<tr>
<td>Ed/ Sallie</td>
<td>M/F</td>
<td>C</td>
<td>56</td>
<td>Baptist</td>
<td>College</td>
<td>Good</td>
<td>No</td>
</tr>
<tr>
<td>Collins/ Elizabeth</td>
<td>M/F</td>
<td>C</td>
<td>54</td>
<td>Catholic</td>
<td>College</td>
<td>Good</td>
<td>No</td>
</tr>
<tr>
<td>Mae/ Frank</td>
<td>F/M</td>
<td>C</td>
<td>79</td>
<td>Baptist</td>
<td>HS</td>
<td>Good</td>
<td>Yes</td>
</tr>
<tr>
<td>Heather/ Scott</td>
<td>F/M</td>
<td>C</td>
<td>41</td>
<td>Baptist</td>
<td>Post-graduate</td>
<td>Good</td>
<td>Yes</td>
</tr>
</tbody>
</table>

Note. In each couple, person with an MI is listed first. F = Female; M = Male; C = Caucasian; AA = African American; HS = high school or less; College = 4 year college; NI = not identified.
postgraduate education; 6 (46%) good MI prognosis, 3 (23%) fair prognosis, 2 (15.5%) poor prognosis, and 2 (15.5%) prognosis not identified; and 4 (31%) with physical complications or problems from an MI before being discharged from the hospital and 9 (69%) without such identified physical complications or problems.

The demographic data in Table 3 for spouses/partners of persons with an MI can be summarized as follows: Nine (69%) female and 4 (31%) male; 6 (46%) African American and 7 (54%) Caucasian; age ranging from 24 to 72 years ($M = 47.5$ years); 6 (46%) Baptist, 2 (15%) Apostolic, 2 (15%) Catholic, 1 (8%) Jehovah’s Witness, 1 (8%) Pentecostal, and 1 (8%) no religious affiliation identified; 8 (62%) with a high school education or less, 3 (23%) with some college, and 2 (15%) with a postgraduate education; 6 (46%) good, 4 (31%) fair, and 3 (23%) poor for MI prognosis; and 4 (31%) with identified physical complications or problems from an MI and 9 (69%) without such identified physical complications or problems.

The demographic data in Table 4 for participant couples can be summarized as follows: Ten (77%) were married, and 3 (23%) were not married (combined range of 3 to 33 years). There was a bimodal distribution by income; most participant couples had an annual family income of either less than $10,000 or greater than $50,000. Seven (54%) of these participant couples had family members, primarily daughters and/or sons, living in the household; 2 of these 7 participant couples had relatives living with them.

Both persons with an MI and their spouses/partners gave the same response about the physical complications or problems experienced by the person with an MI and about the number of days spent in the hospital. Those complications were shortness of breath,
sleep apnea, stent placement, coronary artery bypass graft, and medication side effects; the number of days in the hospital ranged from 3 to 18 days.

Table 4

Demographics of Participant Couples (n = 13 Couples)

<table>
<thead>
<tr>
<th>Couples</th>
<th>Marital status</th>
<th>No. of years together</th>
<th>Family incomea</th>
<th>Household family members</th>
<th>Types of physical problems</th>
<th>No. of hospital days</th>
</tr>
</thead>
<tbody>
<tr>
<td>Betty/Fred</td>
<td>Not married</td>
<td>25</td>
<td>$20-30</td>
<td>0</td>
<td>None</td>
<td>4</td>
</tr>
<tr>
<td>Anthony/Natalie</td>
<td>Married</td>
<td>3</td>
<td>$20-30</td>
<td>3</td>
<td>Short of breath</td>
<td>6</td>
</tr>
<tr>
<td>George/Jessica</td>
<td>Married</td>
<td>9</td>
<td>&lt;$10</td>
<td>2</td>
<td>Sleep apnea</td>
<td>7</td>
</tr>
<tr>
<td>Joshua/Frances</td>
<td>Not married</td>
<td>15</td>
<td>&lt;$10</td>
<td>0</td>
<td>None</td>
<td>14</td>
</tr>
<tr>
<td>Phillip/Tamarin</td>
<td>Not married</td>
<td>15</td>
<td>$10-20</td>
<td>2</td>
<td>None</td>
<td>8</td>
</tr>
<tr>
<td>Marvin/Stella</td>
<td>Married</td>
<td>5½</td>
<td>&lt;$10</td>
<td>4</td>
<td>Stent placement CABG</td>
<td>9</td>
</tr>
<tr>
<td>Aaron/Ruth</td>
<td>Married</td>
<td>7</td>
<td>&lt;$10</td>
<td>0</td>
<td>CABG</td>
<td>18</td>
</tr>
<tr>
<td>Jean/Sam</td>
<td>Married</td>
<td>8</td>
<td>$30-40</td>
<td>3</td>
<td>None</td>
<td>4</td>
</tr>
<tr>
<td>Mitch/Sarah</td>
<td>Married</td>
<td>20</td>
<td>&gt;$50</td>
<td>0</td>
<td>CABG</td>
<td>7</td>
</tr>
<tr>
<td>Ed/Sallie</td>
<td>Married</td>
<td>33</td>
<td>&gt;$50</td>
<td>0</td>
<td>None</td>
<td>3</td>
</tr>
<tr>
<td>Collins/Elizabeth</td>
<td>Married</td>
<td>33</td>
<td>&gt;$50</td>
<td>1</td>
<td>None</td>
<td>6</td>
</tr>
<tr>
<td>Mae/Frank</td>
<td>Married</td>
<td>7</td>
<td>$40-50</td>
<td>0</td>
<td>Medication</td>
<td>4</td>
</tr>
<tr>
<td>Heather/Scott</td>
<td>Married</td>
<td>20</td>
<td>&gt;$50</td>
<td>2</td>
<td>None</td>
<td>3</td>
</tr>
</tbody>
</table>

Note. CABG = coronary artery bypass graft.
a In thousands of dollars per year

Tables 5 and 6 depict the results of purposive sampling for age, gender, and ethnicity for the 13 participant couples entered in the study. I was able to enroll the minimum number of participants needed by gender and ethnicity with the exception of 1 African American female with an MI and 1 African American male spouse/partner.
Table 5

*Persons With a Myocardial Infarction Who Were Entered in the Study*

<table>
<thead>
<tr>
<th>Racial/Ethnic composition</th>
<th>Age range</th>
<th>No. entered</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Male</td>
<td>Female</td>
</tr>
<tr>
<td></td>
<td>Male</td>
<td>Female</td>
</tr>
<tr>
<td>African American</td>
<td>26-63</td>
<td>36</td>
</tr>
<tr>
<td>Caucasian</td>
<td>51-56</td>
<td>41-79</td>
</tr>
</tbody>
</table>

Table 6

*Spouses/Partners of Persons With a Myocardial Infarction Who Were Entered in the Study*

<table>
<thead>
<tr>
<th>Racial/Ethnic composition</th>
<th>Age range</th>
<th>No. entered</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Male</td>
<td>Female</td>
</tr>
<tr>
<td></td>
<td>Male</td>
<td>Female</td>
</tr>
<tr>
<td>African American</td>
<td>49</td>
<td>24-48</td>
</tr>
<tr>
<td>Caucasian</td>
<td>43-72</td>
<td>48-56</td>
</tr>
</tbody>
</table>

Ethical Considerations

Approval to conduct this study was obtained from the IRB for the University of Alabama at Birmingham, and support was obtained from facilities accessed within this study. Before the interview, I talked with potential participants over the telephone to establish rapport and trust. During this process, my role as researcher was discussed. The purpose and expectations involved in the research project were described, as was an explanation of confidentiality and anonymity. Once the participant couples agreed for me to make personal contact, a convenient time and location for this initial meeting were established with them both.

After introductions but before the initial interview took place, written informed consent was obtained from each member of the participant couple willing to participate in the study. Other preinterview procedures included informing each individual participant of the nature and focus of the study and giving each one a consent form to further
explicate the purpose of this research. Consent forms were then signed by each individual participant before the audiotaped interview transpired.

Individual participants were free to withdraw from the study at any time. Identification of the participants remained anonymous. Pseudonyms were used to identify participants within the written text of this research report. Security precautions were taken to preserve privacy. All audiotapes and transcripts remained locked in a file cabinet whenever data were not being reviewed, and only the researcher had access to the cabinet.

Pilot Test of Interview Questions

Before data collecting for this study, I recruited one Caucasian man with an MI for participation in a pilot test for the interview questions and training for the research assistant. This one-time interview was audiotaped and transcribed for review; the reviewers consisted of the chair of my dissertation committee, the research assistant, and me. This review revealed the efficacy of the interview questions and exposed some interview technique issues that were resolved with the research assistant. The data collected from this interview were not reported in the findings section of this study.

Data Collection

Over an 18-month period, the research assistant and I performed data collection as a team, with one interviewing one member of the couple and the other interviewing the other member of the couple. Before each participant couple was interviewed, a signed informed consent was obtained from each individual participant; each individual participant also received a copy (see Appendix G). In addition, a demographic data questionnaire with an assigned participant code (see Appendix H) was completed by each
individual participant. Participants were instructed that, to ensure anonymity, these codes would be used instead of names for identification purposes when the transcripts were typed. Participant couples were interviewed in their home simultaneously at two different times: within 6 weeks after diagnosis of the MI and then at 3 months from this diagnosis.

Each individual participant was interviewed during the initial and follow-up interviews in a separate area of the home to ensure confidentiality. To make certain that the primary researcher was immersed in the participants’ experience, the research assistant and I interviewed the opposite individual of the participant couples at the 3-month follow-up. The semistructured interview included one set of open-ended questions for the person with an MI at the initial interview, a different set of open-ended questions for the spouse/partner during the initial interview, and a third set of open-ended questions for both members of the couple during the follow-up interview (see Appendix I). The initial interview questions focused on the physical and emotional aspects of the heart attack (occurrence, diagnosis, prognosis, and recovery) and then progressed into the spiritual aspect for both the person with an MI and the person’s spouse/partner. The follow-up interview questions continued with the same focus but covered the period between the initial interview and the follow-up interview; in addition, the questions asked during the later interview clarified any data collected during the first interview. Over the course of the study, one question was reworded to enhance clarity and the participants’ understanding; in addition, two questions emerged during the interview process as data were analyzed for commonalities and differences. These were as follows: (a) “What made you decide to call or not call 911 for an ambulance?,” (b) “Do you believe that you have recovered or your spouse/partner has recovered from this experience?” Both the
initial and follow-up interviews for the person with an MI and the spouse/partner lasted an average of 30-60 min. Initial interviews (within 6 weeks of the MI diagnosis) were obtained for all of the 13 participant couples; however, 3-month interviews were not obtained for 2 of the participant couples entered in the study. Reasons for not getting these interviews were that 1 spouse/partner was not comfortable with discussing the experience and that we were unable to contact 1 participant couple to schedule the interview despite making numerous attempts over a 7-day period. During the interview, the participants’ responses were audiotaped, and field notes were taken to assist in data interpretations. Immediately after each initial and follow-up interview, individual participants were compensated $10.00, for a total of $20.00; thus, participant couples were compensated $40.00.

Data Management

Before each interview, the audiotape and demographic data questionnaire were assigned a participant code. All audiotapes were transcribed by a transcriptionist, after which I further reviewed the transcribed interviews with the audiotapes. Transcriptions were analyzed through the use of computer software known as QSR NVivo (Version 2). This software is used to assist in storing and organizing data in qualitative research. Demographic data of all participants were loaded into the Statistical Package for Social Sciences (SPSS; Version 11.0) for storage and computations. All audiotapes and field notes were kept in a locked cabinet during the research process, and the destruction of audiotapes and field notes will occur after the dissertation is completed and published.
Data Analysis

Initially, each participant couple’s interviews were analyzed individually and then from a dyadic perspective to determine any similarities and differences. Once this form of analysis was done, all transcripts for the person with an MI and all transcripts for the spouse/partner were analyzed separately to determine similarities and differences within groups. Last, all transcripts were analyzed from a dyadic perspective to determine similarities and differences.

Data collection and analysis were conducted simultaneously. It is important to note that hermeneutic research is not a linear or structured process but one that is circular, seamless, and reflective. The data obtained from the interviews were analyzed according to the stages identified by Diekelmann and Ironside (1998).

*Stage One*

An entire interview is read to obtain an overall understanding of the text. Themes are identified within the interview. Themes are recurring categories of common experiences and are described using excerpts from the texts to serve as supportive data of the interpretation.

*Stage Two*

The researcher will continue to reread the written interpretations of the themes with supporting excerpts from the interview.

*Stage Three*

Other interviews will be read, interpretation of themes identified, and compared with other interpretations for similarities and differences. Any
discrepancies in interpretation are clarified by referring back to the
interview text.

Stage Four
The purpose of this stage is to identify relational themes. A relational
theme is one that cuts across many texts. Interpretations generated in
previous stages are read and studied to reveal any similar or contradictory
interpretations that are present in the various interviews. Whenever
conflicts arise among the various interpretations within the interviews,
extensive documentation from the texts will be provided to support the
choice of relational themes.

Stage Five
During this stage of interpretation, a constitutive pattern may emerge. A
constitutive pattern is present in all the interviews and expresses the
relationships of the relational themes. Constitutive patterns are the highest
level of hermeneutical analysis.

Stage Six
The purpose of this stage is to validate the analyses by persons familiar
with both the content and research method. In this stage, the investigator
provides the opportunity for review of the entire analysis by individuals
with expertise in these areas.

Stage Seven
The final stage involves preparation of the final research report using
sufficient excerpts from the interviews to allow for validation of the
Strategies to Ensure Validity and Rigor

According to Lincoln and Guba (1985), naturalistic studies such as phenomenology are examined throughout for their trustworthiness. Trustworthiness can be established by four major criteria: “credibility, dependability, confirmability, and transferability” (Lincoln & Guba, p. 189). From these terms, Lincoln and Guba developed four major aspects to meet the difficulties encountered in establishing trustworthiness in qualitative inquiry:

1. Truth value: How can one establish confidence in the truth of the findings of a particular inquiry for the subjects and for the context in which the inquiry was conducted? (p. 189)

2. Consistency: How can one determine whether the findings of an inquiry would be repeated if the inquiry were replicated with the same subjects and in the same context? (p. 189)

3. Neutrality: How can one establish the degree to which the findings of an inquiry are determined by the subjects and conditions of the inquiry and not by the biases, motivations, interests, or perspectives of the inquirer? (p. 189)

4. Applicability: How can one determine the extent to which the findings of a particular inquiry have applicability in other contexts or with other subjects? (p. 189)

Within this research, I addressed these criteria in the following ways. Credibility, or the aspect of truth value, was achieved by engaging in conversation with the participants to establish a rapport and a trusting relationship. Also, participants’
interviews were audiotaped, and field notes were taken for further reference in the research process to validate findings about the participants’ experience. Dependability, or the aspect of consistency, was achieved by my continuously moving back and forth between the actual interviews and the emerging themes. In addition, an external researcher was asked to review the raw data and the interpretations to establish a consistency in the findings. Confirmability, or the aspect of neutrality, also was achieved by the use of an external researcher who was an expert in the content area and in the research method. Transferability, or the aspect of applicability, was achieved by providing an in-depth description of the research setting/context and the data collection/analysis process. Using this method to meet the criterion of transferability was a weakness of the study and is discussed in the Limitations section.
CHAPTER 4
EXPERIENCING AN MI THROUGH
THE ACUTE RECOVERY PHASE

Introduction

The transcribed text for both persons with an MI and their spouses/partners revealed rich data from the initial and follow-up interviews. To clearly present the findings, the data analyzed within this chapter are from the acute recovery phase; the subsequent chapter addresses the extended recovery phase. Data analysis revealed several relational themes from among and between persons with an MI and their spouses/partners. These relational themes are presented in chronological order to describe all aspects of the acute recovery phase. Within the two chapters, relational themes are addressed for the overall primary research question of this study: “What is the role of spirituality for persons with an MI and their spouses/partners during the recovery process?” In addition, the two chapters contain findings related to the secondary research questions that emerged from this primary research question. These questions are as follows:

1. How is spirituality defined and experienced by persons with an MI?
2. How is spirituality defined and experienced by spouses/partners of the persons with an MI?
3. How is the experience of spirituality similar and different for persons with an MI and their spouses/partners?
4. How has the experience of spirituality affected the recovery process for persons with an MI and their spouses/partners?

Understanding the recovery process requires understanding the context in which recovery occurred. Therefore, the initial discussion will focus on participants’ thoughts and feelings at the time of the MI event and diagnosis. Then the discussion will focus on participants’ life changes and supportive resources since hospitalization and discharge home during the acute recovery phase.

Relational Theme: Lacking Awareness and Delaying Treatment

Many of the couple participants did not realize that a heart attack was occurring and hesitated to seek treatment. This delay lasted from several hours to several days. When this finding was explored with participant couples, the common explanation given was that the episode was thought to be gas or indigestion. Of all participants, two different individuals, a person with an MI and a spouse, stated that they knew that a heart attack was occurring. Ed, a person with an MI, acknowledged,

I thought it might be a little indigestion, but after I went back to bed and it started hurting worse. I broke out in a real bad sweat. I knew I was having a heart attack.

I mean that was one of the signs.

Ruth, a spouse, stated, “He grabbed his chest and said, ‘I’m really feeling nauseous.’ He had begun to get an ashy look to him and sweaty and clammy, cold feeling you know. I said, ‘I think you are having a heart attack.’” The 911 emergency system was activated by only 3 of the couple participants. The other 10 couple participants were taken to the hospital in a personal vehicle. Those participant couples who did not activate the 911 emergency system were asked why they did not do so. Their responses were very similar
and focused on the lack of trust in the emergency system’s ability to arrive and transport them within an appropriate time to the hospital. For instance, Marvin, a person with an MI, stated, “I suppose they could have got 911, but 911 might have been too slow.”

These same sentiments were expressed by Ed, a person with an MI:

> I know the response time is not that good and in fact we had a gentleman that had a heart attack at our church during church service the other night and died in the church service . . . it took 15 minutes for the ambulance to get there. So, when I knew I was having one and I knew she [his spouse] was right beside me, I knew she could drive me up there.

His spouse, Sallie, stated,

> We never considered calling the ambulance ’cause we just knew that we had to get there and we just didn’t have time to wait. Thinking back it made me kind of nervous, but the whole time I was doing it, it didn’t ’cause I knew we had to get there.

When Sallie was further questioned about whether she would drive him to the hospital if he again experienced the same symptoms, she responded, “I would.”

When transport by personal vehicle was examined in terms of whether the trip began in a rural or an urban location, no difference was found. Equal numbers of participants transported in this manner were taken from rural and urban areas to the hospital. Distances varied from approximately 2-30 miles to the nearest hospital for these participants.
Relational Theme: Fear and Disbelief in the Midst of Uncertainty

Many of the participant couples acknowledged that, during the diagnosis, they were “scared” or afraid. This feeling of fright resulted primarily from the uncertainty of what the prognosis would be or of what was going to occur in the next few hours to days, including whether the person with an MI would survive. For example, George, a person with an MI, stated, “I was scared because I did not want them to do no cutting.” Aaron, a person with an MI, also stated that he “was scared. I never have been sick. I did not know what to expect.”

Both persons with an MI and spouses/partners indicated that they were in disbelief or denial, some because of age and others because of health status. Natalie, a spouse (husband’s age = 26 years), stated,

Well at first, I was in disbelief, I didn’t really, you know, he’s too young, you know, and it was just a lot of I couldn’t believe it, you know. I think, you know, I think that was for someone old, you know, so it was just really disbelief.

Sam, a spouse, said, “I was thinking to myself, well, this cannot be right because she is too young” (wife’s age = 36 years). Aaron (age = 55 years), a person with an MI, also stated, “I was too young.”

Another reason for disbelief was the perception that the person with an MI was in good health. Aaron said that he was in “good health” when the heart attack occurred. Ed, a person with an MI, stated, “I really have been in good health and never needed to see doctors.” Sarah, a spouse, was also in dismay when told that Mitch had had a heart attack; “I said, ‘How?’ I mean he just went to the doctor 3 weeks ago and he was fine.”
The uncertainty perceived by 3 of the couple participants also resulted from their belief that the person who had an MI would not survive. This thought of dying occurred for these participants either during the initial physical symptoms or upon receipt of the diagnosis. Anthony, a person with an MI, and his spouse, Natalie, both believed that he was going to die.

[Anthony] I just had that feeling. I just kept saying to myself that I cannot go yet, I cannot go yet. I felt like I was dying. [Natalie] When he went out, he wasn’t even hooked up to his monitor because they had took it off. I am glad I had went back into the room and I think about that all the time and I get kind of emotional ’cause he could not be here.

Joshua, a person with an MI, told his partner, Frances, that he thought he “was dying and might not get a chance to see her no more.” He “told her if he had done her wrong, he was sorry.” Frances acknowledged that, when Joshua had the heart attack, “I knew that he could have died.” Jean, a person with an MI, was very emotional during her response and stated, “You ask God, ‘Why now? You know I want to be here for my daughter.’ Then you ask, ‘Why? I want to be there to raise my daughter.’” Her spouse, Sam, also acknowledged that, when hospital personnel told him that she was in intensive care, he was concerned and questioned whether she would survive. He said, “You know, when you in ICU [Intensive Care Unit] that’s pretty bad, and I’m like, ‘Lord, I hope she makes it.’ I knew she was strong, but I did not know.” These participants, as well as others, believed that the heart attack and survival were a result of only God and had occurred for a reason. However, not all participants understood the purpose.
Relational Theme: Seeking Meaning and Purpose

Some of the participants, particularly those persons with an MI, believed that the heart attack happened for a reason. The event was considered a warning sign or a message from God, but the content of the message was not always known by these participants. For instance, Joshua, a person with an MI, agreed that the heart attack was “a sign, something He wants me to do and I been dodging away from it. Saying I’m going to do it and not doing what He wants me to.” When asked what that something might be, he responded, “What he really wants me to do, I don’t know exactly what yet.”

Aaron, a person with an MI, believed that, if it had not been for the Lord I would not have been here, so I believe that He [God] has something else in store for me. I am not sure what it is. It has certainly made me stop and think about my spiritual life because I have not been regularly going to church. God has something else for me to do.

His spouse, Ruth, also noted that she believes “that, if God wants you, he will take you regardless. He didn’t take him. So, I feel like He left him for a purpose, you know, he’s got some reason for still being here.” Phillip, a person with an MI, believed that God “woke him up.” “Like I be saying, we been living in sin. . . . I am going to get married to her, don’t want to leave her here where she can’t take care of the house and don’t have extra money.” Stella, a spouse, believed that “God gave him that light heart attack to show him who He [God] was. Sometimes God will put something on you to show you who He is, you know. He really does. I found that out. He does.”

For a couple of participants with an MI, the heart attack was a warning sign to improve their health by changing their lifestyle. Heather, a person with an MI, believed
that this heart attack was a wake-up call to change eating habits by reducing foods high in cholesterol and sodium and to exercise more. Ed, a person with an MI, also believed that his heart attack indicated that he needed to change dietary habits, exercise, and reduce stress.

Relational Theme: Changes in Life After an MI

Having an MI resulted in many changes, both positive and negative, that affected virtually all aspects of the participants’ lives and relationships. These changes included modifying dietary habits, increasing exercise, reducing stress, praying, reading the Bible, attending church, limiting household tasks and work, increasing role responsibility, and limiting intimacy.

The changes in dietary habits, exercise, and levels of stress that were mentioned earlier by Heather and Ed promoted overall well-being. Their spouses, as well as other spouses/partners, alluded to these changes occurring in their lives. Scott, Heather’s spouse, said, “I have always wanted her to do more exercise. I think it would make her feel better . . . I know it makes me feel better when I do it.” Ed’s spouse, Sallie, indicated, “I am trying to do what he’s doing. I’m walking with him . . . and trying to eat what he eats.” Elizabeth, a spouse, indicated that this event has made her consider her own health and that she intends to get a checkup. Another spouse, Jessica, noted that change was a challenge. She and her husband were trying to use the diet sheet given to them upon his discharge from the hospital, but changing their dietary habits was still difficult because they were so accustomed to eating highly seasoned food. The change was especially difficult for her husband; Jessica stated that she had to “constantly, constantly be bothering him” about his food.
Besides lifestyle changes, spiritual changes were noted by some participants. Aaron, a person with an MI, did not hesitate to acknowledge that this event had changed his spiritual life. “It has certainly made me stop and think about my spiritual life because I have not been regularly going to church. . . . I’m going to church this Sunday.” Other persons with an MI and spouses/partners indicated that they were praying and/or reading their Bibles more on a daily basis, as well as thinking more about their immortality. Several of the participant couples noted that they were living on a day-by-day basis. For instance, Anthony, a person with an MI, agreed that everything was at a “slower pace now” and said that he takes “one day at a time.” Ruth, a spouse, stated, “It definitely will make you put it into perspective, you know, and take it one day at a time.”

A few participants commented that the event had changed the emotional aspect of persons with an MI. For example, Tamarin, a spouse of Phillip, noted that he had calmed down and was different in the way in which he reacted to and talked with people; “He hadn’t been talking, you know, all rough to people. It makes me feel a lot better ‘cause he used to be so rude to people.” Natalie, another spouse, indicated that her husband had always been unkind to her sister but that, since the heart attack, he had become open and allowed her to visit at their home. Some persons with an MI believed that the heart attack may have been brought on by stress; thus, they attempted to stay calm, not worry, and reduce their workload or, in other words, to reprioritize.

However, not all changes from the MI elicited positive feelings. For instance, some of the physical changes caused persons with an MI to be limited in their performance of household tasks, as well as in their ability to work, and resulted in an increase in role responsibility and sometimes in stress for their spouse/partner. The
limitations brought about mixed emotional feelings for both persons with an MI and their spouses/partners. Phillip, a person with an MI, stated, “I can’t mow my yard or my mama’s yard.” Collins, a person with an MI, stated that his greatest concern was that he was going to miss a few weeks of work. I run my own construction business. . . . So, it would be harder to keep them together working long distance by phone. . . . That made me a little down because you know that you are putting work on somebody else.

His wife, Elizabeth, indicated that life was very stressful to her “because [she] had to do more and he was telling [her] to do this, do this” about the business. Jessica, a spouse, also felt overwhelmed by George’s heart attack. His physical limitations required that she do all of the household chores, be the financial provider, and be a parent. In her interview, she said, “I have to do a whole lot. . . . It seems to be getting worse. . . . I have to think for him and myself and you know, trying to work with a baby. . . . So it really makes it hard.”

Two participants, one a person with an MI and the other a spouse, discussed the inability to have an intimate relationship with their spouse/partner. Joshua, a person with an MI, stated that the event had dramatically affected his life because he was at that time nothing but a comfort keeper . . . all I can do mostly is keep her company. The doctor says it is too early for me to try something now. . . . Since I am an older man and she a young woman that scares me . . . she might go on and leave me anyway.

Stella was more afraid to have a sexual relationship with her husband, Marvin. She
commented, “I’m scared. I’m really scared to have sex with him. . . . He had the heart attack when we were making love. . . . He thinks I don’t want to do nothing with him, but it’s not that.”

Participants expressed various life-changing aspects from the MI that yielded both positive and negative feelings from an individual, as well as from a couple, perspective. These changes affected all states of being for these participants; however, the spiritual aspect was noted to serve as a positive influence on the ability to manage the MI event and recovery.

*Relational Theme: Connecting With God Through Beliefs*

Both persons with an MI and their spouses/partners acknowledged the MI as a life-changing event. Although these changes affected primarily the physical perspective, a majority of persons with an MI and their spouses/partners indicated their handling of the event was influenced by their spiritual being. This spiritual component was defined similarly among persons with an MI and their spouses/partners in that the context was focused on a religious perspective. However, the religious component differed for these participants in the way in which they exercised their faith (in essence, their beliefs and rituals). The majority of both persons with an MI and their spouses/partners acknowledged that spirituality involved believing in a Higher Power (God/Jesus for the participants in this study) who was watching over them, taking care of them, and helping them through this event and through other occurrences. The following interview excerpts illustrate the participants’ definition of *spirituality*:

Betty, a person with an MI, stated,
It means to believe. To know there is somebody with higher powers that can take care of you and I believe that. . . . I know that if He had not been there pushing us or holding us up or whatever that we wouldn’t still be here, as far as my children and me with this heart attack. . . . Spiritual to me is knowing there is somebody with a higher power than you. . . . He has got to pull you through. . . . I believe that He had a hand in me surviving this.

Jean, a person with an MI, said, “Spiritual means that you know there is a God and understand how he works through your life. . . . I thank God for letting me survive the heart attack.” Mae, a person with an MI, stated, “God is the head of me. It’s like I told you; I’m a sinner saved by grace through faith, and God is going to take care of everything else.”

Joshua, a person with an MI, described the meaning of spirituality as “always got someone watching over you; someone that loves you more. . . . He [God] was watching over me with this heart attack.” This sense of a bond (love) was noted by Ed, a person with an MI, when he indicated that spirituality involved “actually having a relationship with God through Jesus Christ . . . actually having a relationship with Jesus Christ is the spiritual side and without that, people are lost, if they don’t have that, that is what I believe.” Ed went on to further note that he based his hope about the recovery experience upon “his beliefs and relationship with Jesus Christ.”

As indicated, the perceptions of the spouses/partners were the same as those of persons with an MI and are exemplified by the following excerpts from interviews. Natalie, a spouse, described spirituality as “just really believing, believing in God you know and believing that he will help you, you know, if you lean toward him, he will help
you and if you believe in him he will help you.” Natalie believed that God was helping them through this experience. Another participant, Jessica, a spouse, noted that her life would be without purpose or meaning. She stated,

I would be lost if I didn’t have God in my life because of all the changes I made, you know, since I came to knowing Christ, it has helped a whole lot. . . . Now it’s like, God I am giving it to you.

One participant, Frank, a spouse, was very adamant about his beliefs and about the meaning of spirituality. “I believe that Jesus Christ died on the cross for my sins and saved me from hell and she [wife] does, too. We are Christians and that’s it.” When asked about whether his beliefs helped him deal with his heart attack, Frank said “Yes” without hesitation but further noted that, because of his beliefs, he did not worry about difficulties such as the heart attack. He indicated that God had blessed them and would take care of them.

Several dyads of persons with an MI and their spouses/partners indicated that the terms spiritual and religious could not be differentiated. For example, Anthony, a person with an MI, was unable to define either term; his spouse, Natalie, saw them as being identical. She indicated that she was both spiritual and religious. Mitch, a person with an MI, and Sarah, his wife, both indicated that spirituality and religiosity were the same.

Some of the persons with an MI indicated that spirituality and religiosity were so interrelated that they could not be separated. In other words, spirituality and religiosity must coexist to work together in and through the lives of individuals. For example, George, a person with an MI, stated that spirituality “means set aside, you know, not doing what the world does, trying to stay clean and holy . . . but following and abiding by
the same characteristics that Jesus does.” Another participant, Marvin, a person with an MI, was reminded of a scripture passage that says, “‘Let your light so shine before men, that they may see the good works of Christ in our lives, and glorify him.’ In other words, lift Him up. Esteem Him high. I esteem Christ very high.”

For several participant couples, spirituality and religiosity were differentiated because spirituality was their faith, whereas religiosity was the exercise of that faith; thus, for those couples, the two concepts were different but not separate. For example, Heather, a person with an MI, indicated that spirituality was “more internal, lot less tangible and lot more internal. . . . You wouldn’t see so much about a person’s spirituality”; she felt that religiosity was “a lot more structured set of beliefs about a Higher Power . . . it is more outward actions. Her spouse, Scott, described spirituality as “a lot more subjective . . . things that you would feel inwardly, whereas religion is lot more objective and ritualistic and things that you can see and procedures and acts by groups of people.” These sentiments were echoed by another couple, Mae and Frank, both of whom described spirituality as consisting of believing in Jesus Christ or God and accepting Him as their Savior. Mae and Frank further stated that religiosity was comprised of their rituals and beliefs and, for them, meant being a Christian.

**Relational Theme: Communicating With God Through Rituals and Practices**

As stated by the participants, this knowing and acceptance of God through a sense of faith or belief either had promoted religious rituals and practices in the past or renewed these rituals and practices in the present. These participants communicated with God through religious rituals and practices such as reading scripture, attending church, praying, or singing; this communication provided a way of handling the MI, which some
Participants described as making them fearful (“scared” or “afraid”). The following excerpts demonstrate the various communication paths that these participants used during the recovery process.

For Phillip, a person with an MI, the Bible provided a sense of direction:

I go to church to hear the preacher, but I read the Bible myself and get my own understanding, been doing it for years . . . at my church I enjoy going and being with the people to worship and sing . . . it makes me feel good.

Aaron, a person with an MI, stated that, although he had attended church in the past, he had not done so for a number of years; however, he was reconsidering such a ritual or practice. He indicated that the heart attack had affected his way of thinking about religious practices. “It’s made me stop and think. I’m still not certain what I’m going to do, but it has made me take a second look.” For Aaron, this experience has also influenced other rituals such as prayer.

Daily prayer, I didn’t pray daily. I did pray, but that is one thing that has changed. . . . I pray each morning when I get up that the Lord would get me through the day and I pray each night before I go to sleep that the Lord would get me through the night. I didn’t do that before.

For George, a person with an MI, music was a way of communication:

I’m keeping a positive mind, you know, I am a church musician. I play the organ, drums, guitars, and stuff like that, staying in church. . . . I just love to go to church. . . . Thank God for healing my body, for he is the only one that could have done that.
For several spouses, prayer was a vital ritual or practice that gave them a sense of support, comfort, and peace, as well as aided in the outcome of the experience. Tammarin, a partner, stated, “I got upset at first, but just like I prayed to God, you know, turned it in his hands ’cause I know it ain't nothing I could do, you know.” These sentiments were expressed by Stella, another spouse: “I say without prayer and God on my side I say I couldn’t. . . . As long as I got God and keep on praying it makes it easier.” Sam, a spouse, stated, “If you believe, prayer can change everything.” Prayer not only is a comfort but provides an avenue by which to ask for comfort and peace. This aspect of prayer was denoted by Sallie, a spouse, who stated, “It is a comfort for you just to have belief in a higher being and you can pray and just ask for comfort and peace and strength to get through things like this.”

Some of the participant couples performed the same rituals and practices and did them separately and together, such as attending church, singing, and praying. Two participant couples had at least 1 member who did not participate in any individual ritual or practice and identified that he or she had no religious affiliation. However, both participants indicated that their spouses involved them in reading scripture and praying.

Relational Theme: Receiving Support and Hope

According to several participants, the prayers of other individuals provided support. Ruth, a spouse, commented that, during the night of the heart attack, she began to pray, as did other church members who were firm believers in prayer; she felt that God heard their prayers and intervened. Sallie, a spouse, further noted that just being able to pray is comforting. You feel that presence there and you know that others are praying ’cause we had, you know, I know right when it happened
our preacher came and we had several people there, you know, and we were on
the prayer list at church. We knew that and people were calling and saying, “You
are on our prayer list, we are praying for you.” I mean all that support, you know,
definitely made a difference.

Besides praying, various other tangible and intangible forms of support were
offered to both persons with an MI and their spouses/partners. Participants identified
sources of support as spouse/partner, family members, church/community family, and
health care providers. Mae, a person with an MI, stated that her husband and son “would
not let me stay here by myself. . . . My son and granddaughter-in-law would come over
here every day and see about me and help out.” Both Jean, a person with an MI, and Sam,
her spouse, agreed that her mother was very supportive in offering words of
encouragement and helping with their 4-year-old daughter. Aaron, a person with an MI,
noted that his and his wife’s families, as well as the church family, provided financial
support. He stated,

If it were not for our family and her church family, we wouldn’t be sitting here
with the lights on right now ’cause we have no income. . . . The church has really
made me stop and take a second look of how I feel about church and the church
experience.

Ruth, Aaron’s wife, stated, “Our church people have just made a real impact on him, you
know, through all this, coming to see him . . . helping to take care of us.”

Anthony, a person with an MI, noted that his wife not only is his support but also
is his sense of hope because she helps him believe that he can do anything and that his
health can improve. Jessica, a spouse, believes that God is her sense of hope. She stated,
Just put God first and he is going to make it better ’cause all your strength comes from God. . . . So you just continue to pray and seek God and it helps . . . it gets a whole lot better, it is going to get better. It will be all right.

Health care providers were sometimes recognized as a source of support. The couple participants were divided in their thoughts regarding whether health care providers met their spiritual needs. Some participants agreed that the providers met their spiritual needs because they perceived the providers to be spiritual people. For example, Ruth, a spouse, said that the nurses talked with her about God, especially when they came in “during the day and I would be reading the Bible or reading my Sunday school lesson.” Also, Ruth noted that these individuals provided spiritual support to Aaron, her husband, through the comments they made to him, which included telling him that he was doing well and that his having survived the MI was a blessing of God. Marvin, a person with an MI, also believed that the health care providers met his needs: “One of my doctors talks to me about the Lord all the time.”

Other participants responded that the health care providers had not given them spiritual support; however, many of them indicated that they did not believe that the providers were there to meet their spiritual needs. Instead, these participants believed that health care providers were there to meet their physical needs at the time. They believed that their spiritual needs were best addressed by the support of each other, their relatives, and their church family. For example, Frances, a partner, indicated that her mother, sisters, and brothers were available during and after the hospital stay to offer words of encouragement. Phillip, a person with an MI, noted that his fiancée notified his pastor, who came to the hospital and to his home to talk and pray with him. Stella, a spouse, also
involved her family pastor by asking the pastor to pray for them. Ed, a person with an MI, believed that the people from his church met his spiritual needs: “Basically, the people from my church came to see me and ministered to my spiritual needs that I had . . . as far as peace and comfort.”

Relational Theme: Bringing Couples Closer

Many couples indicated that, through the recovery process, they had become closer. This closeness within the acute recovery was a result of the emotional disturbances caused by the diagnosis and prognosis of the heart attack. Being closer was perceived as being of greater assistance than before and as being more affectionate. For example, Marvin, a person with an MI, noted that his spouse would kiss him whenever she walked past him or tended to his needs; he stated, “She don’t want me to do nothing.” Scott, a spouse, indicated that he, too, tried to be more helpful to his wife and that he was a little protective, as exemplified by his calling more often during the day. Jessica, a spouse, stated,

> It [the heart attack] scared him and like he used to go without me. . . . I didn’t know where he was or how he was doing, but now he lets me know exactly when and where he is going and how long he will be gone.

Some couple participants indicated that their closeness resulted from a spiritual awakening. Sam, a spouse, noted that he and his wife were each praying more often and that they were praying together more often. Ruth, a spouse, believed that she and Aaron, her husband, were on a spiritual journey together and that positive changes would ensue because Aaron had different thoughts about his spiritual life and religion since the heart attack.
In summary, the recovery process for these participants involved many different aspects during its course. The process can be divided into three periods: when the symptoms of a heart attack occurred, when the diagnosis was made, and then afterward. Many participants lacked the ability to recognize the symptoms of a heart attack, and this inability caused delay in seeking medical treatment. Once the diagnosis of a heart attack was determined, participants experienced fear, denial, disbelief, and awareness of the possibility of death. All of these emotions stemmed from the uncertainty that emerged from this diagnosis and that eventually led the participants to seek the reason for the heart attack and for their ultimate survival. Many participants believed that the heart attack was a warning sign. For a few, this warning sign was an indication to change their lifestyle; for others, the meaning of the warning sign was unclear. These lifestyle changes affected the physical, spiritual, and emotional well-being of the participants, both individually and as a couple. Although participants often focused on lifestyle changes from the physical aspect, the aspect of spirituality was considered a vital component throughout their acute recovery phase. The concept of spirituality was perceived by these participants within the context of faith, religious beliefs, rituals, and practices. These participants had various levels of spiritual commitment that were evidenced by their sources of support and sense of hope for the future, as well as by their perceptions of their spiritual needs’ being met.
CHAPTER 5
EXPERIENCING AN MI THROUGH
THE EXTENDED RECOVERY PHASE

Introduction

Within this chapter, the data analysis is focused on the extended recovery phase from among and between persons with an MI and their spouses/partners. The results yielded new relational themes; however, some of the same relational themes identified from the acute recovery phase were also present. For those relational themes that were the same, the discussion focuses more on the difference between the acute and extended recovery in an attempt to provide a deeper understanding of the overall recovery experience. As stated in chapter 4, these relational themes were extended beyond the research questions for this study in an effort to describe all aspects of the extended recovery phase.

Relational Theme: Feelings of Worry and Being Cautious

In much the same way that the acute recovery phase elicited feelings of being afraid in many of the participants, the extended recovery experience yielded expressions of worry or concern about the possibility of having another heart attack. These feelings were primarily expressed by persons with an MI; however, a few spouses/partners also indicated that they were worried. Heather, a person with an MI, acknowledged that she “worries or thinks about having another heart attack.” Her husband, Scott, indicated that he continued to be protective by calling and checking on her daily. George, a person
with an MI, stated that he sometimes worries and thinks about having another heart
attack, particularly when he becomes tired and short of breath. He, too, indicated that his
family is “still watchful” in terms of what he is eating and the medication he is taking.
Jessica, his wife, noted that, if “she did not go with him, she worried until he got back
home.” Jean, a person with an MI, also voiced concern about having another heart attack:

I do, I do, I take my medication first thing in the morning and it’s just whenever
you get soreness and they say that does occur sometimes, you can feel the
soreness and that is just a little concern and it will bother you ’cause you thinking
why is my chest still sore. . . . It’s hard and you know being my age and I really
shouldn’t just think about it, you know, and I talk to other people that has had
heart attacks and they always telling me just don’t think about it. Just live your
life, you think about it and then something might occur. It’s just me having to, I
guess, psych myself out or wean myself out of thinking about it and live my life
and stop worrying about the heart attack and just go on with my daily life.

This participant’s spouse, Sam, felt that worrying might not be good; thus, he
tried not to worry. He stated, “She worries about it. . . . Worrying, they tell you that stress
will kill you and worry is not good for you”; however, he indicated that, like his wife, he
worries, too.

For a few participants such as Marvin, a person with an MI, there were no
worries; “I pray and believe the Lord that He is going to keep me.” However, Marvin
further noted that he is “not going to do nothing that I think would bring on another one.”
Therefore, although he did not worry about having another MI, he was being cautious in
an attempt to prevent a future MI. Mitch, a person with an MI, stated that he did not
worry about the heart attack; “I hardly think about it. It is just something that happened.” However, this participant made several lifestyle changes in the acute recovery phase to improve his physical and emotional well-being and indicated in the follow-up interview that he had continued these changes. In essence, then, the participants who were not actively worried about the possibility of having another MI seemed to have successfully implemented changes to address their health and possibly prevent the occurrence of a future event.

Relational Theme: Seeking Meaning and Purpose

During the extended recovery phase, some participants were still searching for the reason that the heart attack had occurred, whereas others believed that they knew and understood the purpose behind the MI. Joshua, a person who had an MI, was an example of someone still questioning the reason for its occurrence. He believed that “God brought him through the experience,” but he still was not sure about its purpose. On the other hand, Aaron, a person with an MI, believed that the heart attack was a way to show him that God was in control of everything:

It let me know that there is a power that has control over us. He was just letting me know that He was in control. It wasn’t my time to go, but He let me know, He could take me out if He wanted to. . . . If I take care of me physically and emotionally, I don’t have any control over how long I will be here. I can do my part trying to keep me around by taking care of my health.

George, a person with an MI, believed that he had been traveling too fast in life and that God placed obstacles in his path to make him slow down and focus on God: “I assume I was running, you know, from God. So, He will do what He can to slow you down, you
know, in a religious way . . . think about him more, serve him more . . . instead of self.”

Jessica, his wife, agreed with him by stating, “I told him, ‘God got you through so much, you got to stop and pay attention and ask him what you need to do because you are not being obedient.’ ” Another clear example of knowing why one had an MI was Phillip. He put into action his earlier thoughts that the heart attack was a sign from God telling him “to straighten up.” He had alluded to the idea of getting married in the initial interview; by the second interview, he and Tammarin were married. “My brother married me and her. I believe He [God] been telling me that we’ve been living in sin.”

Although some persons with an MI, like Ed and Heather, identified the heart attack as a warning sign in the acute recovery phase, other participants such as Mitch only acknowledged in the second interview that the heart attack was a wake-up call for them. Mitch had quit smoking and had begun exercising and losing weight in the acute recovery to improve his health; however, he did not indicate until the second interview that he had undertaken these changes as a possible means of preventing a future MI.

**Relational Theme: Changes in Life After an MI**

In the acute recovery phase, several persons with an MI and their spouses/partners had undergone physical, emotional, and spiritual changes in their lives. For some participants, these lifestyle changes continued in the extended recovery phase; for others, either the changes did not continue or new changes emerged. The continuation of lifestyle modifications was most evident in terms of physical and dietary lifestyle changes. For example, a couple, Ed and Sallie, noted in their interviews that they continued to maintain a healthy lifestyle by changing eating habits and walking, “still on the cardboard diet . . . no salt, no fat, same old diet . . . walking.” Exercising, eating more healthfully,
and not smoking continued to be a part of the routines of Mitch, a person with an MI, who said that he was eating

chicken and turkey, vegetables. . . . I do have a sweet tooth, but I hadn’t eaten any since I had my heart attack . . . walking about 2 or 2 1/2 miles a day . . . doing physical therapy at a gym to help with the soreness in my back from the surgery and build my muscles. . . . As far as smoking, I have been quit now for 3 months. His wife, Sarah, noted that their eating habits remained changed; “Chicken, all we eat is chicken. I’m so tired of chicken . . . but it is okay . . . we are adjusting and it will be fine . . . he is healthier.” She also validated Mitch’s statement that exercise continued to be a part of their daily activities; “we walk every day and he goes to the gym 3 days a week because he lost his muscle tone in his arms.”

However, Heather, a person with an MI, reported that, although she has continued making better choices about foods, such as decreasing the fat and sodium content in her diet, she had not been exercising on a regular basis; “I watch the fat intake, eat more whole grain, I do the oatmeal. I haven’t exercised in about 2 weeks. One of those things where I didn’t go one day and then I didn’t go another day soon it was a couple of days.” Her husband, Scott, commented that “she was doing pretty much the exercise routine a lot at the beginning and has kind of slowed down a little bit and I haven’t been on her quite as much.” George, a person with an MI, indicated that he “really had not been eating like [he was] supposed to.” He agreed that he had reduced the amount of food that he was eating but reported that he had not eliminated some of the foods high in sodium and fat. Both Heather and George exemplify the finding that not all participants in the
study were successful in maintaining the lifestyle changes that they had initially implemented.

During the extended recovery phase, some participants experienced emotional and spiritual changes that had not been present during the acute recovery. For instance, although Aaron, a person with an MI, emphasized spiritual changes in the initial interview, he discussed both negative and positive emotional changes during the follow-up interview. For example, Aaron became depressed; “I was just sitting here.” His wife, Ruth, stated, “He could not get out and do things”; as a result, she notified his physician. At the time of the follow-up interview, Aaron was taking an antidepressant and, according to his wife, was greatly improved; “I have seen a big change, he’s not as moody . . . everything is good. I’m good, he’s good.” Ed, another person with an MI, also noted at the follow-up interview that he was experiencing some negative emotional changes. “I think my emotions come to the top a lot easier than they did before. I feel them a lot easier, whereas before I didn’t.” When questioned about the possibility of his experiencing some depression, he stated, “I don’t think its depression. I think it’s just emotions.”

Positive changes discussed during the follow-up interview include Aaron’s statement that his heart attack had altered the way he thought about life:

I took everything for granted before I had the heart attack. . . . I’m feeling better. . . . I didn’t realize how close I came to dying, but it’s made me stop and think. . . . I’m taking one day at a time . . . you just never know, what’s coming down the road at you. So, it’s definitely changed the way I approach each day.
This perspective of approaching life day by day was noted by several other participants, both persons with an MI and their spouses, in the extended recovery phase. Joshua noted that occurrences that had bothered him in the past did not affect him as intensely; “I’ve got to the point, I just kind of shut it out, let it go on by. . . . It might hurt me for a minute, but it ain’t going to hurt forever. I live one day at a time now.” Mitch, a person with an MI, noted that his MI had been a wake-up call and had resulted in his making lifestyle changes but that maintaining those changes in the extended recovery was an ongoing struggle, a daily battle to stay focused and committed and to take one day at a time. When asked about the extended recovery experience, Jessica, a spouse, noted, “Just take it one day at a time. You just have to take it one day at a time.” Another spouse, Elizabeth, also agreed that she takes “one day at a time. . . . We realized that we might not see a tomorrow. . . . We appreciate things more in life.” The notion of living one day at a time was a common theme at the time of the follow-up interviews and was a change for several participants.

Only Aaron and George, persons with an MI, emphasized religious changes in their lives that occurred during the extended recovery. For instance, Aaron stated, “I haven’t been real religious in the past and I guess that this was one way that’s brought me back. . . . There are good people in her church and they really helped us out during my heart attack and afterwards. It’s more of a family at her church than the church I went to and it has just changed my way of thinking as far as structured religion.

George had been involved in religious activities before the heart attack; however, he had assumed more leadership responsibilities in the church since the acute recovery phase,
such as becoming a deacon. He indicated that this position made him “more serious” about his church involvement and activities (reading scripture and praying).

In the acute recovery phase, many participants focused on the physical aspect of life changes; in contrast, the extended recovery phase involved a greater focus on the emotional aspect, such as coping with the daily activities of life. A few of these participants experienced depression, heightened emotions, and living day by day as they began living with their MI event.

**Relational Theme: Progressing in Recovery**

Participants acknowledged that their progress in the extended phase of the recovery experience was influenced by their spiritual beliefs and rituals, lifestyle changes, and ability to resume daily activities. Several participants expressed their belief in the ability of God or a Higher Power to bring them through the recovery experience. Marvin, a person with an MI, said,

> We know that God intervened. It wasn’t all medical personnel that kept me here, so it had to be the Lord. . . . I believe and I trust in God and I have faith to believe that God would bring me through . . . that’s the reason why I recovered this far, real good, excellent. I mean with excellent spirit and with an uplifted spirit.

His wife, Stella, also believed that, “as long as he keeps on doing what the doctors tell him to do and keeps on believing in God and having faith, that he’s going to be all right.” Another person with an MI, Joshua, also believed that God had guided him through the recovery experience and was “helping him handle the way he is living now.”

A few of the participants firmly believed that, if they maintained healthier lifestyles, they would recover without any problems. Jean, a person with an MI, noted
that she would be fine as long as she kept taking her medications, eating more healthfully, and following her doctor’s orders. Marvin, a person with an MI, stated, “I believe that, if I keep doing what they told me, low-sodium diet and lose weight, I believe everything is going to be all right.”

Although none of the persons with an MI stated that they had completely recovered from the experience, a few spouses believed that their partner had done so. For example, Sallie believed that her husband, Ed, had recovered; “Like I said, we have had lifestyle changes and our eating habits and he is getting more exercise. . . . Other than that he is back at work and things are kind of normal, like they were before.” Another spouse, Sarah, also stated, “It’s like he has never really had one, except like for the exercising and changing the ways of eating and quit smoking, but other than that, our lifestyle is really still the same.” Frank, a spouse, believed that his wife, Mae, had recovered because she had returned to her normal activities; “She’s back like she always was and they told her she could be.”

Relational Theme: Receiving Support and Hope

Participants during the extended recovery phase identified some of the same sources of support and hope that they had noted in the acute recovery phase, such as spouses/partners, family members, and church/community family. However, during the follow-up interview, both persons with an MI and their spouses/partners emphasized God more as their source of support and hope. They depended upon God to handle the challenges, especially the physical and emotional, in the recovery experience. Spiritual activities such as praying, reading scripture, and attending church were ways used by many of the participants to seek God’s support and comfort. Tammarin, a spouse,
indicated that God was very much present in her life and that she relied on Him to help her through the experience. Mae, a person with an MI, stated, “I look back over my life. God has been with me all the way, all the way. He was right there with me all the way.” George and Jessica, a couple, stated that they depend more on God since the MI occurred; “We just pray and give it to God . . . try not to even worry about it.” Because of Jessica’s increased role responsibility, she became “stressed and frustrated.” Therefore, she noted, “Without prayer and God on my side I say I couldn’t. I say I would be gone but, as long as I got God and keep on praying, it makes it easier.” Joshua, a person with an MI, also stated, “I pray a lot. I still pray a lot. I ain’t got hooked up in church yet, but I do pray a lot.” He agreed that prayer had helped him handle both the heart attack experience and his financial “situation.” Jean, a person with an MI, stated that “attending church and praying has helped a lot. It helps and makes you forget and it eases a lot of fears.”

Ruth, a spouse, spoke about the couple’s financial burden but noted, “God watches over us. . . . The church family when he was in the hospital was just amazing, people coming and giving me love offerings. . . . God watched over us and He provided and He still is.” Sam, a spouse, thought that Jean, his wife, “every day gets closer to God. . . . When she had the heart attack she brought us closer to her and God.” Ed, a person with an MI, agreed that his deepening faith allowed him to work through the whole experience and gave both him and his wife “comfort and a sense of peace and hope.” Jessica, a spouse who noted during the initial recovery that God was her sense of hope, further indicated that God was her main support. “He has shown Himself and
proved Himself to us because there are a lot of things He has done for us” during this experience, as well as during others.

In summary, participants during the extended recovery phase continued to experience some of the same issues that they had encountered in the acute recovery phase. However, these issues often had a different or new direction. For instance, feelings of worry continued during the extended recovery phase, but the perspective changed to concern about having another MI. Some participants continued to search for the meaning and purpose of the MI event, whereas others had a clear understanding. For many participants, the lifestyle changes were maintained but sometimes not easily; other participants had not successfully sustained these changes. However, for some participants, new emotional and religious changes emerged in the extended recovery. The progression of the recovery experience was perceived by participants at different levels. The perception was influenced by several factors, among which was the concept of spirituality. In the follow-up interview, participants expressed a stronger belief that God helped them meet the difficult challenges and served as a form of support and hope and therefore brought them a sense of comfort and peace.
CHAPTER 6
DISCUSSION OF FINDINGS IN THE ACUTE AND EXTENDED RECOVERY PHASES

Introduction

As stated in chapter 1, the purpose of this research was to increase the understanding of the ways in which spirituality was experienced by both persons with an MI and their spouses/partners in the recovery process. Data collected over both the acute and extended recovery phases yielded a better understanding of spirituality for both persons with an MI and their spouses/partners, as well as providing insight into other aspects of the recovery experience. In this chapter, the discussion focuses primarily on those findings related to spirituality but also includes an examination of other findings that emerged from both the acute and the extended recovery phases. In addition, areas of future research are highlighted.

Findings

Spirituality As Faith and Beliefs

The majority of participants, both persons with an MI and their spouses/partners, defined spirituality from a religious perspective that focused on faith and beliefs. When participants were asked to differentiate between spirituality and religiosity, some were able to make a distinction; however, others could not do so. Participants who made a distinction described spirituality as subjective and internal and considered religiosity to be action oriented and external; thus, the two components were different but not separate.
In other words, their faith and beliefs were demonstrated through their rituals and practices. Therefore, participants believed that God/the Lord assisted them through both the acute and the extended recovery experiences. He watched over them, allowed them to survive the heart attack, and assisted in the recovery process. In studies conducted by Narayanasamy (2002) and Albaugh (2003), similar responses were given by participants with either chronic or life-threatening illnesses as they described their experience as reaching out and trusting in God for help in managing their situation.

**Spirituality Through Rituals and Practices**

The rituals and practices in which these participants exercised their faith and beliefs differed among and between both persons with an MI and their spouses/partners. Some participants communicated with God/the Lord by praying and reading the Bible, and others connected with Him by singing and playing music. Many of the participant couples performed these rituals and practices together. Whatever rituals or practices were performed, participants received a sense of comfort and peace, as well as an ability to handle the outcome of the MI. For the participants in this study, the primary source of support and hope was God/the Lord in both the acute and the extended recovery experiences. Receiving support in living with and managing a life-threatening illness was identified by participants in a study conducted by Albaugh (2003). Participants in Albaugh’s study attained a sense of comfort through spiritual beliefs and were strengthened by their devotion to reading scripture, praying, and singing; these responses are consistent with those of participants in the current study. Kaye and Robinson (1994) found the use of daily scripture reading and prayer as coping resources to be more prevalent among caregivers of persons with chronic illness than among care recipients.
The use of such practices as a way of coping was also noted by Theis et al. (2003) in both caregivers and care recipients and was referred to as a “formal religion” (p. 51) by these authors. Miller (1989) found that several hope-inspiring strategies were identified by persons with critical cardiac illness; one of those strategies focused upon spiritual methods from the perspective of having a relationship with God to overcome suffering and crisis. A similar strategy was employed by the participants of the present study during the acute and the extended recovery experiences as a way of managing an acute MI.

**Spiritual Support and Hope**

In the acute recovery experience, support and hope came not only from God/the Lord but from spouses, family members, the church/community family, and health care providers. These individuals provided spiritual, emotional, and physical support to both persons with an MI and their spouses/partners. Support came both in the form of words of encouragement from their spouses/partners, family members, and health care providers and in the form of prayer and financial assistance from the church/community family, as well as from family members. Reports from the research literature indicate that these sources of support have been utilized to assist others with handling or coping with their illness (Albaugh, 2003; Beach et al., 1992; Clark & Heidenreich, 1995; Forbes, 1994; Miller, 1989, 1991; Narayanasamy, 2002; Santavirta et al., 2001; Stewart et al., 2000; Theis et al., 2003; Theobald, 1997). In those studies (Albaugh; Beach et al.; Clark & Heidenreich; Forbes; Miller, 1989, 1991; Narayanasamy; Santavirta et al.; Stewart et al.; Theis et al.; Theobald), as well as in this study, the emotional and spiritual support
provided by spouses/partners, family, and health care providers helped both persons with an illness and their spouses/partners cope with the illness and sustain hope.

Although health care providers were recognized as a source of support and hope, only a few participants among either persons with an MI or their spouses/partners indicated that health care personnel provided spiritual support. However, many participants believed that health care providers were there not to meet their spiritual needs but to meet their physical needs. This perception was different in previous studies (Clark & Heidenreich, 1995; Miller, 1989, 1991) conducted with critically ill persons and/or their spouses/partners. The studies conducted by Clark and Heidenreich and by Miller (1989) identified hope as an element of spirituality that was inspired by health care providers who established a trusting relationship with acutely ill persons and their spouses/partners. Health care providers’ ability to foster and sustain hope in these participants provided the participants with a way of coping. Miller (1991) found that individuals were able to maintain hope through a reciprocal relationship that was established among health care providers, persons with illness, and spouses and that resulted in spiritual bonds. In the current study, the finding that some participants believed that health care providers were there to meet only their physical needs may have resulted from the fact that, during the initial diagnosis and hospitalization, basic physical needs were considered a priority. Individuals were focused on immediate physical care from health care providers. Thus, participants may actually have needed spiritual support from health care providers during the initial or acute recovery period but were not able to acknowledge this need until further in the recovery process, possibly even after hospitalization. Furthermore, because spirituality was defined by these participants from
a religious perspective, they may have been unable to recognize the existence of spiritual needs beyond religious rituals and practices or to recognize the possibility that spiritual needs could have been met by health care providers. Another finding reported in previous studies (Kettunen et al., 1999; Santavirta et al., 2001; Stewart et al., 2000) revealed that persons with an illness and their spouses/partners also needed emotional support from health care providers to reduce stress and promote better outcomes. This form of support (emotional) was not identified by the participants in the present study, possibly because they were asked only about spiritual support or needs from health care providers.

Of all of the sources of support and hope identified in the acute recovery experience, the strongest source of support for participants in the extended recovery phase was God/the Lord. During the latter period, both persons with an MI and their spouses/partners depended upon God/the Lord to help them handle the emotional and financial challenges they encountered from the event, such as increased role responsibilities and financial obligations. Once again, rituals and practices of praying, reading scripture, and attending church were ways in which these participants found God’s support and found comfort and hope.

Spiritual Development

When examining the effect of demographic characteristics such as age, gender, and ethnicity of these participants on the way in which they described spirituality, I determined that these factors did not influence their descriptions. The finding that age had no effect was in contrast to the results from studies by Heintz and Baruss (2001) and Isais et al. (1999), who found that older populations were more aware of their spirituality. In my study, a difference was noted between participants who identified a religious
affiliation and those who did not do so. This difference occurred in the way in which they communicated with God/the Lord through rituals and practices. The participants who did not state a religious affiliation, one person with an MI and one spouse/partner, spoke about their spouse’s/partner’s praying and/or reading the Bible to them but never identified any rituals and practices of their own.

**Meaning and Purpose**

Throughout the recovery experience, both persons with an MI and their spouses/partners searched for the meaning and purpose of the event. Participants believed that the heart attack had happened for a reason known by God, but they were unable to articulate that reason. They believed that God had given the heart attack as a sign or message and thus had spared their lives for some purpose. This finding was consistent with those of two other phenomenological studies conducted by Albaugh (2003) and Narayanasamy (2002), in which chronically and acutely ill persons described their experiences as providing an impetus to search for meaning and purpose because the illness had caused them to recognize the importance of life; in other words, the participants felt that they had received a “wake-up call” (Albaugh, p. 596). The sign or message indicated a need for participants to make a change in their lives. For some of the participants in this study, life changes focused more on the spiritual aspect; for others, the changes concentrated more on the physical aspect. However, most participants who had made physical life changes also had made spiritual and emotional life changes.

**Lifestyle Changes and Adjustments**

These life changes resulting from the MI affected participants in both positive and negative ways during the acute and extended recovery experiences. The positive
perspective can be seen in the finding that these participants became more focused on health-promoting behaviors and on spiritual activities.

Respondents changed their lifestyle to include health-promoting behaviors such as healthier food choices, exercise, and avoidance of counterproductive habits (e.g., cigarette smoking). These physical lifestyle changes continued for these participants into the extended recovery phase. In addition, participants spiritually altered their lives by becoming involved on a regular basis with attending church, reading scripture, and praying, as well as by becoming focused on living life one day at a time and on reprioritizing life events. This new spiritual focus in participants’ lives caused emotional changes and adjustments. These participants attempted to manage their stress and control their emotions by changing their attitudes. Results from several studies (Landis, 1996; Mackenzie et al., 2000; McNulty et al., 2004) that focused on health-promoting behaviors (spiritual and/or emotional) demonstrated consistency with findings from this study. Landis, Mackenzie et al., and McNulty et al. identified the influence of psychosocial adjustment on spiritual and psychological well-being. Participants’ physical, spiritual, and emotional changes resulted from an attempt to adjust and to regain control of their lives. These efforts to adjust and to regain control were consistent with those seen by Johnson and Morse (1990) during their examination of the adjustment process of persons with an MI. For some of the participants in the Johnson and Morse study, adjusting and “living again” (p. 134) occurred.

Just as there were positive physical and emotional changes, there were also negative physical and emotional changes. The limitations caused by the physical changes experienced by the person with an MI produced role strain and stress for both persons
with an MI and their spouses/partners; as a result of the alterations in their role function and responsibilities, emotional changes occurred in these participants. Bennett (1992) and Hilbert (1996) found that persons with an MI and their spouses experienced emotional distress from the spouses’ increased role responsibilities. In the current study, these emotional changes were noted by several participants during the extended recovery experience and were described as depression and heightened emotions by persons with an MI and as anxiety and tension by their spouses/partners.

The emotional disturbances that accompanied the diagnosis and prognosis of an MI brought many of the participant couples closer. Being closer was perceived as assisting in activities of daily living, being more affectionate and protective, and participating in spiritual activities. Although participant couples acknowledged that they were protective, none indicated feeling the sense of overprotectiveness noted in some studies (Kettunen et al., 1999; Stewart et al., 2000); neither did couple participants indicate the isolation or difficulties in their relationships found in the study by Theobald (1997). However, a few participants, persons with an MI and spouses/partners, expressed having sexual problems because of being worried about the possibility of the occurrence of another MI or recovery complications; this finding was also reported by Stewart et al.

Feelings of Uncertainty

Many participants, both persons with an MI and their spouses/partners, expressed feelings of being afraid and worried because of the uncertainties related to the heart attack. Initially, some participants were worried about surviving the MI, and others were in disbelief that the event had occurred. In the extended recovery period, participants continued to express feelings of concern and worry that another MI might occur. These
feelings of uncertainty about the recovery were noted in the literature (Bennett, 1992; Kettunen et al., 1999; Stewart et al., 2000) for both persons with an MI and their spouses. The findings from the studies by Bennett, Kettunen et al., and Stewart et al. revealed that uncertainty occurred because persons with an MI and their spouses/partners were concerned about physical threats or recovery-related difficulties (having another MI).

Delay in Treatment

Last, many participants delayed seeking treatment because of their lack of education about a heart attack and because of their lack of trust in the 911 emergency system. Participants appeared to be in a state of denial about their symptoms and about the possibility of having a heart attack. Although participants had the symptoms of gas and/or indigestion, only a few were able to relate them to a heart attack and the need to seek emergency assistance. For these participants, seeking emergency assistance through the 911 emergency system was not considered an option. In rural and urban communities, participants expressed mistrust in the ability of the 911 emergency system to respond within a reasonable length of time; thus, many of these participants traveled by personal vehicle.

Limitations

This study incorporated a purposive sampling technique. The sample consisted of individuals with specific characteristics relative to age, gender, and ethnicity; therefore, the findings of this study are applicable only to other groups with these same qualities. Another limitation of this study was the transferability in regards to the research setting/context. The study was conducted in a geographical area often referred to as the
Bible Belt; as a result, the beliefs and perspectives of the study participants may not be as
diverse as those of persons living in another geographical location may be.

Future Research

Spirituality played a vital role in the recovery process for these persons with an MI and their spouses/partners. Further research is needed to understand the role spirituality plays in other acute life-threatening illnesses, as well as in those illnesses that are not necessarily life threatening. This research must be conducted at different stages of the diagnosis and recovery to increase the understanding of the impact of spirituality in individuals and couples. Because these participants used spirituality to cope with the changes in their lives, a comparative literature review of spirituality and coping may bring about conceptual and operational clarity, thus promoting theoretical development. As noted in this study, the research literature is very limited that reports the results of studies in which spirituality was examined from a family perspective. Therefore, research needs to focus on spirituality in family theory development. Another area of research to explore is spiritual development. Although the participants of this study did not demographically demonstrate any variation in spiritual development, further research is warranted in this area to explore whether various stages or benchmarks of spiritual development influence the role of spirituality in the recovery process.

From this study, several questions emerged that need to be explored in future research endeavors. One question is when health care providers need to provide spiritual support. This study provided a better understanding of the meaning of spirituality and the importance of delivering spiritual support in the recovery process to persons with an MI and their spouses/partners. However, at what point during the recovery process spiritual
support is of the most benefit for individuals and whether the timing is different for persons with an MI than for spouses/partners remain unclear. Also, future research needs to examine spirituality at intervals of the recovery process that are different from and longer than those utilized in this study. Another area of research, although it was not the primary aim of the study, involves the delay in seeking treatment for an MI and the infrequency with which the emergency system is activated. For these participants, whether they lived in a rural or an urban area, the reason for not activating the 911 system was their concern about the response time. Besides the need for research examining ways of improving response times, a need exists for the implementation of community education that teaches persons to recognize the signs and symptoms of an MI and to understand the importance of seeking treatment immediately.

Conclusions

Both persons with an MI and their spouses/partners defined spirituality within a religious context based on faith and beliefs that were expressed through rituals and practices. These rituals and practices determined the differences in the participants’ experience of spirituality. From the sources of God/the Lord, spouses/partners, family members, church/community family, and health care providers, participants were able to receive the support and hope required to survive the MI and to progress in the recovery process. Because these participants survived, both persons with an MI and their spouses/partners searched for the meaning and purpose of the event, with many of them believing that life changes were needed. These participants were able to adapt to both positive and negative lifestyle changes and adjustments from a physical, emotional, and
spiritual aspect during the recovery experience; thus, the participants were able to cope with the MI.

Although spiritual support was not recognized by a majority of these participants as being provided by health care workers, a need for this type of support was acknowledged. The spiritual support and changes identified by these participants provided them with an ability to derive a sense of comfort from knowing that someone was watching out for them and handling the outcome of the event. In the clinical arena, health care providers need to meet all needs, including spiritual ones, of persons with an MI and their spouses/partners. One way of providing for spiritual support is to establish a strong, trusting relationship between the person with an MI and his or her spouse/partner. As the demands within the health care field continue to grow rapidly, health care providers are spending less time with patients and their families, and in-hospital recovery time is shorter; as a result, the establishment of a relationship is often impossible. Health care providers must recognize and understand the importance of establishing a rapport with the patient and family as a part of providing holistic care that will promote a positive recovery outcome. Persons evaluating whether to involve ancillary departments within health care facilities, such as social work, clergy, and case management, must bear in mind not only the person with an MI but the spouse/partner. The inclusion of both the person with an MI and the spouse/partner will provide an opportunity for both to receive spiritual support, individually and together.
LIST OF REFERENCES


APPENDIX A

REQUEST FOR LETTER OF SUPPORT FROM PHYSICIAN CLINICS
Physician Clinic

Address

My name is Vicki Bingham and I am a doctoral candidate at the School of Nursing, University of Alabama at Birmingham. I am conducting a research study entitled “The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners” to complete requirements for the degree, Doctor of Philosophy in Nursing. I am requesting a written letter of support to recruit participants for the study at your facilities upon approval from the Institutional Review Board at the University of Alabama at Birmingham and your facility.

The study involves taped interviews of persons with a myocardial infarction (MI) and their spouses/partners expressing their lived experiences of spirituality during the recovery process. Demographic data will be collected for sample description. Confidentiality of the participants will be maintained and prospective participants will receive a written explanation of the study and information on their rights as participants in the informed consent.

The data collection will begin upon immediate approval from the Institutional Review Board and will last over a six to eight month period. If you have any questions, please contact me by telephone at (662) 843-9539 (home) or (662) 846-4257 (office).

Thank you for your consideration and assistance in this request.

Sincerely,

Vicki Bingham, RN MSN
Doctoral Candidate
School of Nursing, University of Alabama at Birmingham
APPENDIX B

LETTER OF SUPPORT FROM PHYSICIAN CLINICS
Dear Mrs. Bingham,

You have permission and support to utilize the clinic, _______________ in both locations of ______________ and ______________ to recruit participants for your research study entitled *The Recovery Experience for Persons with an MI and Their Spouses/Partners*.

It is understood that recruitment will occur over the next six to eight months in the clinic at both locations with the assistance of the nurse practitioner(s) for potential MI participants. To be considered as a potential MI participant, the person must have a diagnosis of a first time myocardial infarction within 3-4 weeks of their initial interview; be at least 19 years of age; and have no physical complications from the MI, such as chest pain or shortness of breath during the first physician visit post MI. Written consent will be obtained from the potential MI participant for the researcher to contact by telephone, regarding interest of participation in the study for both the person with an MI and the spouse/partner and to determine eligibility of the individual and the spouse/partner.

The recruitment of participants for this study is feasible, as based upon the criteria listed above, because the clinic in both locations provide health care to a minimum of five first time myocardial infarction patients on a monthly basis.

Sincerely,

______________, MD
Cardiologist
APPENDIX C

INSTITUTIONAL REVIEW BOARD FOR HUMAN USE APPROVALS AND PROJECT REVISIONS/AMENDMENTS
Form 4: IRB Approval Form
Identification and Certification of Research
Projects Involving Human Subjects

UAB's Institutional Review Boards for Human Use (IRBs) have an approved Federalwide Assurance with the Office for Human Research Protections (OHRP). The UAB IRBs are also in compliance with 21 CFR Parts 50 and 56 and ICH GCP Guidelines. The Assurance became effective on November 24, 2003 and the approval period is for three years. The Assurance number is FWA00005960.

Principal Investigator: BINGHAM, VICKI
Co-Investigator(s):
Protocol Number: X050607014
Protocol Title: The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners

The IRB reviewed and approved the above named project on 4/30/05. The review was conducted in accordance with UAB's Assurance of Compliance approved by the Department of Health and Human Services. This Project will be subject to Annual continuing review as provided in that Assurance.

This project received EXPEDITED review.
IRB Approval Date: 4/30/05
Date IRB Approval Issued: 4/30/05

Marilyn Doss, M.A.
Vice Chair of the Institutional Review Board for Human Use (IRB)

Investigators please note:

The IRB approved consent form used in the study must contain the IRB approval date and expiration date.

IRB approval is given for one year unless otherwise noted. For projects subject to annual review research activities may not continue past the one year anniversary of the IRB approval date.

Any modifications in the study methodology, protocol and/or consent form must be submitted for review and approval to the IRB prior to implementation.

Adverse Events and/or unanticipated risks to subjects or others at UAB or other participating institutions must be reported promptly to the IRB.
Federal regulations require IRB approval before implementing proposed changes. Please complete this form and attach the changed research documents. Change means any change, in content or form, to the protocol, consent form, or any supportive materials (such as the Investigator’s Brochure, questionnaires, surveys, advertisements, etc.)

Principal Investigator: Vicki Lynnette Bingham, RN, MSN  
Date: November 1, 2005  
Contact: 73 Oakridge Drive Boyle MS 38730  
Phone #: (662)843-9539  
Fax #: (662)846-4267  
E-mail: vbingham@delmarstate.edu  
Campus Address: N/A  
Study/Protocol Title: The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners  
IRB Protocol #: X050607014

Current Status of Project: (check only one)  
☒ Currently in Progress (# participants entered: 2)  
☐ Study has not yet begun (no participants entered)  
☐ Closed to participant enrollment (remains active); # participants on therapy/intervention___; # participants in long-term follow-up only

This submission changes the status of this study in the following manner: (check all that apply)  
☒ Protocol Revision  
☒ Revised Consent Form  
☐ Protocol Amendment  
☐ Addendum (new) consent form  
☐ Study Closed to participant entry  
☐ Enrollment temporarily suspended by sponsor  
☐ Study Terminated  
☐ Other, (specify) ___

1. Briefly describe, and explain the reason for, the revision or amendment. Include a copy of supportive documents with changes highlighted. Please highlight changes/revisions/additions to the consent form, protocol, research questionnaire, etc. Recruitment of participants has been a challenge due to the time period of the initial interview and the two current rural physician clinics not having a sufficient number of persons with an MI being referred for their care. With many MI participants having procedures or complications following their event, the current 3-4 weeks for the initial interview needs to be extended to within 6 weeks of the MI diagnosis for the initial interview. Furthermore, another rural physician clinic that specializes in cardiovascular has been added to the recruitment efforts (see protocol pages and consent form).

2. Does this revision/amendment revise or add a genetic or storage of samples component?  
☐ Yes ☒ No

If yes, please see the Guidebook to assist you in revising or preparing your submission documents or call the IRB office at 4-3789.

3. Does the change affect subject participation (e.g. procedures, risks, costs, etc.)?  
☐ Yes ☒ No

4. Does the change affect the consent document?  
☒ Yes ☐ No

If yes, briefly discuss the changes. The explanation of procedures will change to reflect the extended time period of within 6 weeks of the MI diagnosis for the initial interview, instead of the 3-4 weeks. Also, risks and discomforts will include referrals to the nurse practitioner and physician in the rural physician clinic that has been added.

Revised 7-15-02
Include the revised consent form with the changes highlighted.
Will any participants need to be reconsented as a result of the changes? □ Yes   ☒ No
If yes, when will participants be reconsented?

Signature of Principal Investigator  Vicki Lynnette Digby  Date 11/01/05

FOR IRB USE ONLY

Date 6/21/05

APPROVED

Marilyn Doss, M.A.
Vice Chair - IRB

Revised 7-15-02
Federal regulations require IRB approval before implementing proposed changes. Please complete this form and attach the changed research documents. Change means any change, in content or form, to the protocol, consent form, or any supportive materials (such as the Investigator's Brochure, questionnaires, surveys, advertisements, etc.).

Principal Investigator: Vicki Lynnette Bingham, RN, MSN
Date: April 14, 2006
Contact: 73 Oakridge Drive Boyle MS 38730 Phone #: (662)843-9539 Fax #: (662)846-4267
E-mail: vbingham@deltastate.edu

Study/Protocol Title: The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners

IRB Protocol #: X050607014

Current Status of Project: (check only one)
- [x] Currently in progress (# participants entered: 5)
- [ ] Study has not yet begun (no participants entered)
- [ ] Closed to participant enrollment (remains active); # participants on therapy/intervention: _____; # participants in long-term follow-up only: _____

This submission changes the status of this study in the following manner:
(check all that apply)
- [x] Protocol Revision
- [ ] Protocol Amendment
- [ ] Study Closed to participant entry
- [ ] Study Terminated
- [ ] Enrollment temporarily suspended
- [ ] Other, (specify): _____

1. Briefly describe, and explain the reason for, the revision or amendment. Include a copy of supportive documents with changes highlighted. Please highlight changes/revisions/additions to the consent form, protocol, research questionnaire, etc.

Recruitment of participants continues to be a challenge due to the three current rural physician clinics not having a sufficient number of persons with an MI who meets the inclusion criteria. Therefore, another rural physician clinic that specializes in cardiovascular has been added to the recruitment efforts (see letter of support and consent form).

2. Does this revision/amendment require revision or add a genetic or storage of samples component?  
   - [ ] Yes  
   - [x] No

   If yes, please see the Guidebook to assist you in revising or preparing your submission documents or call the IRB office at 4-3789.

3. Does the change affect subject participation (e.g., procedures, risks, costs, etc.)?  
   - [x] Yes  
   - [ ] No

4. Does the change affect the consent document?  
   - [x] Yes  
   - [ ] No

   If yes, briefly discuss the changes. Risks and discomforts will include referrals to the nurse practitioner and physician in the rural physician clinic that has been added. Include the revised consent form with the changes highlighted.

Will any participants need to be reconsented as a result of the changes?  
   - [ ] Yes  
   - [x] No

If yes, when will participants be reconsented?  

Signature of Principal Investigator: Vicki Lynnette Bingham
Date: April 14, 2006

FOR IRB USE ONLY

Revised 7-13-02

Marilyn Bogg, M.A.
Vice Chair – IRB
Form 4: IRB Approval Form
Identification and Certification of Research
Projects Involving Human Subjects

UAB's Institutional Review Boards for Human Use (IRBs) have an approved Federalwide Assurance with the Office for Human Research Protections (OHRP). The UAB IRBs are also in compliance with 21 CFR Parts 50 and 56 and ICH GCP Guidelines. The Assurance became effective on November 24, 2003 and expires on February 14, 2009. The Assurance number is FWA00005960.

Principal Investigator: BINGHAM, VICKI
Co-Investigator(s): 
Protocol Number: X050607014
Protocol Title: The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners

The IRB reviewed and approved the above named project on 05/20/06. The review was conducted in accordance with UAB's Assurance of Compliance approved by the Department of Health and Human Services. This Project will be subject to Annual continuing review as provided in that Assurance.

This project received EXPEDITED review.

IRB Approval Date: 05/20/06
Date IRB Approval Issued: 05/30/06

Marilyn Doss, M.A.
Vice Chair of the Institutional Review Board for Human Use (IRB)

Investigators please note:

The IRB approved consent form used in the study must contain the IRB approval date and expiration date.

IRB approval is given for one year unless otherwise noted. For projects subject to annual review research activities may not continue past the one year anniversary of the IRB approval date.

Any modifications in the study methodology, protocol and/or consent form must be submitted for review and approval to the IRB prior to implementation.

Adverse Events and/or unanticipated risks to subjects or others at UAB or other participating institutions must be reported promptly to the IRB.
Project Revision/Amendment Form

(Rev. 4/7/2004)

(Please type: In MS Word, highlight the shaded, underlined box and replace with your text; double-click checkboxes to check/unchecked.)

Federal regulations require IRB approval before implementing proposed changes.

Please complete this form and attach the changed research documents. Change means any change, in content or form, to the protocol, consent form, or any supportive materials (such as the investigator's brochure, questionnaires, surveys, advertisements, etc.)

Principal Investigator: Vicki Lynette Bingham, RN, MSN
Date: October 19, 2006
Contact: 73 Oakridge Drive Boyle MS 38730 Phone #: (662) 843-9539 Fax #: (662) 846-4267
E-mail: vbingham@del state.edu

Campus Address: N/A
Study/Protocol Title: The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners
IRB Protocol #: X050607014

Received

NOV - 3 2006

Institutional Review Board

Current Status of Project: (check only one)

☐ Currently in Progress (# participants entered: ?)
☐ Study has not yet begun (no participants entered)
☐ Closed to participant enrollment (remains active); # participants in therapy/intervention ; # participants in long-term follow-up only.

This submission changes the status of this study in the following manner(s): (check all that apply)

☐ Protocol Revision
☐ Protocol Amendment
☐ Study Closed to participant entry
☐ Study Terminated
☐ Revised Consent Form
☐ Addendum (new) consent form
☐ Enrollment temporarily suspended by sponsor
☐ Other, (specify).

Briefly describe, and explain the reason for, the revision or amendment. Include a copy of supportive documents with changes highlighted. Please highlight changes/revisions/additions to the consent form, protocol, research questionnaire, etc.

Recruitment of participants continues to be a challenge due to the current rural physician clinics not having a sufficient number of persons with an MI who meet the inclusion criteria. Therefore, churches within several surrounding counties (Bolivar, Sunflower, and Leflore) have been added to the recruitment efforts, thus including the following counties in the study: Bolivar, Coahoma, Leflore, Sunflower, and Washington (see letters of support and protocol).

1. Does this revision/amendment revise or add a genetic or storage of samples component?

☐ Yes ☐ No

If yes, please see the Guidebook to assist you in revising or preparing your submission documents or call the IRB office at 4-3789.

2. Does the change affect subject participation (e.g. procedures, risks, costs, etc.)?

☐ Yes ☐ No

3. Does the change affect the consent document?

☐ Yes ☐ No

If yes, briefly discuss the changes.

Include the revised consent form with the changes highlighted.

Will any participants need to be reconsented as a result of the changes?

☐ Yes ☐ No

If yes, when will participants be reconsented?

Signature of Principal Investigator

Date 10-19-06

FOR IRB USE ONLY

APPROVED

Marilyn Doss, M.A.
Vice Chair - IRB

Revised 7-13-02
UAB's Institutional Review Boards for Human Use (IRBs) have an approved Federalwide Assurance with the Office for Human Research Protections (OHRP). The UAB IRBs are also in compliance with 21 CFR Parts 50 and 56 and ICH GCP Guidelines. The Assurance became effective on November 24, 2003 and expires on February 14, 2009. The Assurance number is FWA00005960.

Principal Investigator: BINGHAM, VICKI
Co-Investigator(s):

Protocol Number: X050607014
Protocol Title: The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners

The IRB reviewed and approved the above named project on 5-15-07. The review was conducted in accordance with UAB's Assurance of Compliance approved by the Department of Health and Human Services. This Project will be subject to Annual continuing review as provided in that Assurance.

This project received EXPEDITED review.

IRB Approval Date: 5-15-07
Date IRB Approval Issued: 5-15-07

Marilyn Doss, M.A.
Vice Chair of the Institutional Review Board for Human Use (IRB)

Investigators please note:

The IRB approved consent form used in the study must contain the IRB approval date and expiration date.

IRB approval is given for one year unless otherwise noted. For projects subject to annual review research activities may not continue past the one year anniversary of the IRB approval date.

Any modifications in the study methodology, protocol and/or consent form must be submitted for review and approval to the IRB prior to implementation.

Adverse Events and/or unanticipated risks to subjects or others at UAB or other participating institutions must be reported promptly to the IRB.
APPENDIX D

CONSENT TO CONTACT
I, ______________________, give permission for Vicki Bingham, MSN RN (researcher) to contact me by telephone about myself and spouse/partner being part of a study entitled *The Recovery Experience of Persons with a Myocardial Infarction (Heart Attack) and Their Spouses/Partners.*

__________________________       ___________________
Signature                    Phone Number

__________________________
Best Time to Contact
APPENDIX E

REQUEST FOR LETTER OF SUPPORT FROM CHURCHES
My name is Vicki Bingham and I am a doctoral candidate at the School of Nursing, University of Alabama at Birmingham. I am conducting a research study entitled “The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners” to complete requirements for the degree, Doctor of Philosophy in Nursing. I am requesting a written letter of support to recruit participants for the study at your church upon approval from the Institutional Review Board at the University of Alabama at Birmingham and your church.

The study involves taped interviews of persons with a myocardial infarction (MI) and their spouses/partners expressing their lived experiences of spirituality during the recovery process. Demographic data will be collected for sample description. Confidentiality of the participants will be maintained and prospective participants will receive a written explanation of the study and information on their rights as participants in the informed consent.

The data collection will begin upon immediate approval from the Institutional Review Board and will last over a six to eight month period. If you have any questions, please contact me by telephone at (662) 843-9539 (home) or (662) 846-4257 (office).

Thank you for your consideration and assistance in this request.

Sincerely,

Vicki Bingham, RN MSN
Doctoral Candidate
School of Nursing, University of Alabama at Birmingham
APPENDIX F

LETTER OF SUPPORT FROM CHURCHES
Dear Mrs. Bingham,

You have permission and support to utilize the church, ________________, in ________________ to recruit participants for your research study entitled *The Recovery Experience for Persons with an MI and Their Spouses/Partners*.

It is understood that recruitment will occur over the next six to eight months in the clinic at both locations with the assistance of the nurse practitioner(s) for potential MI participants. To be considered as a potential MI participant, the person must have a diagnosis of a first time myocardial infarction within 6 weeks of their initial interview; be at least 19 years of age; and have no physical complications from the MI, such as chest pain or shortness of breath during the first physician visit post MI. Written consent will be obtained from the potential MI participant for the researcher to contact by telephone, regarding interest of participation in the study for both the person with an MI and the spouse/partner and to determine eligibility of the individual and the spouse/partner.

Sincerely,

______________

Pastor
APPENDIX G

INSTITUTIONAL REVIEW BOARD FOR HUMAN USE INFORMED CONSENT
UAB Consent Form

TITLE OF RESEARCH: The Recovery Experience for Persons with a Myocardial Infarction and Their Spouses/Partners

INVESTIGATOR: Vicki Lynnette Bingham, RN, MSN

SPONSOR: None

Explanation of Procedures
You are invited to participate in a research study designed to explore the factors that influence the recovery experience for both persons with a heart attack and their spouses/partners. In order to participate in the study, the participant with a heart attack must be: 1) diagnosed with a heart attack for the first time within 6 weeks of the initial interview; 2) able to speak English; 3) able to comprehend and understand information; 4) at least 19 years of age; 5) committed for at least two years in a relationship with a spouse/partner and the spouse/partner willing to participate in the study. Participation is completely voluntary.

If you decide to participate in the study, you will be asked to complete a questionnaire requesting personal information about you and your family and two audiotape recorded interviews, one within 6 weeks and another at 3 months following diagnosis of the heart attack, with each lasting about 60 minutes. Interviews will take place in private locations either at your home or a convenient location, if you prefer, and scheduled at a time convenient for each of you. During the interview, you will be asked about your or your spouse’s/partner’s heart attack experience, recovery experience, and factors that influenced recovery, including spiritual beliefs, hope and support. At the completion of the study, you may be contacted by phone or mail to review the findings for clarification.
Risks and Discomforts
In this study, there is a potential risk involved concerning personal sharing. The interview may cause you to remember unpleasant or painful feelings and emotions. Therefore, you may not answer any questions that you do not wish to answer. You may withdraw from the study at any time without any consequences. Referrals may be made for further follow-up to Angie Parish, FNP, BC, Kyla Holcomb, FNP, BC, Lula Hoskins, FNP, BC, Dr. John Herzog, MD Cardiologist, Dr. Michael Mansour, MD Cardiologist or Dr. Roger Weiner, MD Cardiologist for the participant with a heart attack and Dr. Donna Starkey, Instructor in Counselor Education at Delta State University, for the spouse/partner.

Benefits
You may not personally benefit from your participation in this research; however, your participation may provide valuable information to the medical community about the factors that influence the recovery experience for a heart attack.

Alternatives
You have the right to not participate.

Confidentiality
The information gathered during this study will be kept confidential to the extent permitted by law. However, representatives of the University of Alabama at Birmingham (UAB) Institutional Review Board (IRB) will be able to inspect your research records and have access to confidential information that identifies you by name. No individual identities will be detectable in any reports or publications resulting from the study.

Withdrawal Without Prejudice
You may leave the interview at any time and withdraw from the study without any consequences. The investigator may not allow you (the person with an MI and/or the spouse/partner) to continue participation if physical safety is jeopardized during the interview.

Significant New Findings
Any significant new findings that develop during the course of the study that may affect your willingness to continue in the research will be provided to you by Vicki Bingham.

Cost of Participation
There will be no cost to you for participation in the research.
Payment for Participation in Research
You will be paid $10.00 for each participated interview. Payment will be made at the
completion of each interview. If you complete the entire study, you will receive a total of
$20.00.

Payment for Research Related Injuries
Neither UAB nor Vicki Bingham have made provisions for monetary compensation in
the event of injury resulting from the research and in the event of injury, treatment is
provided, but is not free of charge.

Questions
If you have any questions about the research or a research related injury, Vicki Bingham
will be glad to answer them. Vicki Bingham’s number is (662)843-9539 or (662)846-
4257. If you have questions about your rights as a research participant, you may contact
Ms. Sheila Moore, Director of the Office of the Institutional Review Board for Human
Use (IRB). Ms. Moore may be reached at (205) 934-3789 or 1-800-822-8816, press the
option for an operator/attendant and ask for extension 4-3789 between the hours of 8:00
a.m. and 5:00 p.m. CT, Monday through Friday.

Legal Rights
You are not waiving any of your legal rights by signing this consent form.

Signatures
Your signature below indicates that you agree to participate in this study. You will
receive a copy of this signed informed consent.

_______________________________________________________
Signature of Participant        Date

_______________________________________________________
Signature of Investigator      Date

_______________________________________________________
Signature of Witness       Date

(Revised: 04/14/06)
APPENDIX H

DEMOGRAPHIC DATA SHEET
Date: _______  Participant Code  _____

AGE: _______

GENDER:
______ Female
______ Male

ETHNICITY:
______ African American
______ Caucasian

RELIGION:
Do you have a religious affiliation? ______ Yes  ______ No
If yes, then what is the affiliation _____________________________

EDUCATIONAL LEVEL:
______ High School or less
______ Some College
______ Two Year College Graduate
______ Four Year College Graduate
______ Post Graduate

MARITAL STATUS:
Are you married? ___ Yes  ______ No
Number of years married or together: __________

SEVERITY OF ILLNESS:
Date of MI (heart attack) __________________________
What was the initial prognosis of the MI (heart attack) _______ Good
______ Fair
______ Poor
Any complications to occur from the MI (heart attack)? _________Yes  ______ No
What were these complications? ___________________________
Number of days spent in the hospital with diagnosis of MI (heart attack) _______

HOUSEHOLD:
Which one best describes your perceived level of family income?
______ Less than $10,000
______ $10,001 - $20,000
______ $20,001 - $30,000
______ $30,001 - $40,000
______ $40,001 - $50,000
______ Greater than $50,000
Besides the spouse/partner, are there other family members living in the house?  
___ Yes ___ No

If yes, identify the family members according to their relationship and age:

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<th>Relationship (i.e. mother, aunt, daughter, son, grandchild)</th>
<th>Age</th>
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APPENDIX I

INTERVIEW QUESTIONS
1. Tell me about your heart attack. When did it happen? Where were you when the heart attack occurred? What were you doing at the time it occurred?

2. What was your understanding about the heart attack? How did you find out that it was a heart attack?
   Probe Questions: How bad was your heart attack? What was the prognosis of the heart attack? What did the healthcare personnel say about your recovery?

3. I am interested in knowing what emotions or feelings you were experiencing when you had your heart attack.
   Probe Questions: Initially, when you were told your diagnosis, how did that make you feel? Now, since it has been 6 weeks since you were diagnosed with the heart attack, how do you feel? Have these emotions or feelings changed over time? How?

4. How has this event affected your life?
   Probe Questions: What meaning did you get from this event? Has the event brought about any change in the way you see or live life? If so, what change has occurred?

5. Has there ever been a time since the heart attack that you thought or believed you would not survive?
   Probe Questions: Has there been a time since your heart attack that you felt that you would not get better or recover? Tell me about your feelings. When did that feeling occur? How do you feel about your recovery now?

6. Who or what helped you to change this feeling?
   Probe Questions: How did this person or thing help you to change this feeling of not recovering or getting better from the experience?

7. Tell me about how you have handled and continue to handle this experience of having a heart attack.
   Probe Questions: Who or what has helped and continues to help you get through this experience. (Initially and now at 6 weeks). Do you feel that you are through the experience?

8. I am interested in knowing about what spiritual and religious means to you.
   Probe Questions: To you, what does it mean to be spiritual? To you, what does it mean to be religious?

9. Tell me about any spiritual beliefs, routines, or rituals that may have influenced or influences the way you handle the experience.
   Probe Questions: Is there a higher being or specific religious/spiritual activities that you are involved in? Who is this higher being and what religious/spiritual activities do you participate in? How often? How are these spiritual beliefs or rituals influencing or have influenced the way you handle the experience.

10. What has been the impact of these beliefs on your spouse/partner or the relationship with your spouse/partner?
    Probe Questions: How have your spiritual beliefs affected your spouse’s/partner’s feelings and experiences about your MI? How has your spirituality affected your relationship with your spouse?
11. What has been the impact of your spouse’s beliefs on you or the relationship with your spouse?
   Probe Questions: Did you notice anything about your spouse’s spiritual beliefs, routines, or rituals during this time? How has this affected you? How has your spouse’s spirituality affected your relationship?

12. If you could identify a sense of hope or support for yourself during this event what or who would it be?
   Probe Questions: If a sense of hope or support could be identified, how did this person or thing provide a sense of hope or support for you during this event?

13. Of what we have discussed today, can you think of anything else healthcare providers could have done to assist you in your recovery experience in terms of spirituality?
   Probe Questions: How could healthcare providers assisted you in meeting your spiritual needs?

14. Is there anything else you would like to tell me about in regards to the recovery experience?

15. Is there anything else you would like to tell me about in regards to spirituality?
(For Spouse/Partner)

1. Let us talk about your spouse’s/partner’s heart attack. I am interested in knowing what emotions or feelings you were experiencing when your spouse/partner had his/her heart attack. Were you present when he/she had the heart attack? What did you do? How did you find out that it was a heart attack? Probe Questions: Initially, when you were told of the diagnosis, how did that make you feel? Now, since it has been 3-4 weeks since the diagnosis with the heart attack, how do you feel? Have these emotions or feelings changed over time? How?

2. How has this event affected your life?
   Probe Questions: What meaning did you get from this event? Has the event brought about any change in the way you see or live life? If so, what change has occurred?

3. Has there ever been a time since your spouse’s/partner’s heart attack that you thought or believed he/she would not survive?
   Probe Questions: Has there been a time since your spouse’s/partner’s heart attack that you felt that your spouse/partner would not get better or recover? Tell me about your feelings. When did that feeling occur? How do you feel now about his/her prognosis?

4. Who or what helped you to change this feeling?
   Probe Questions: How did this person or thing help you to change this feeling of your spouse/partner not recovering or getting better from the experience? Tell me about how you have handled and continue to handle this experience of your spouse/partner having a heart attack.
   Probe Questions: Who or what has helped and continues to help you get through this experience. (Initially and now at 6 weeks). Do you feel that you are through the experience?

5. I am interest in knowing about what spiritual and religious means to you.
   Probe Questions: To you, what does it mean to be spiritual? To you, what does it mean to be religious?

6. Tell me about any spiritual beliefs, routines, or rituals that may have influenced or influences the way you handle the experience.
   Probe Questions: Is there a higher being or specific religious/spiritual activities that you are involved in? Who is this higher being and what religious/spiritual activities do you participate in? How often? How are these spiritual beliefs or rituals influencing or have influenced the way you handle the experience.

7. What has been the impact of these beliefs on your spouse/partner or the relationship with your spouse/partner?
   Probe Questions: How have your spiritual beliefs affected your spouse’s/partner’s feelings and experiences about his/her MI? How has your spirituality affected your relationship with your spouse/partner?

8. What has been the impact of your spouse’s/partner’s beliefs on you or the relationship with your spouse/partner?
   Probe Questions: Did you notice anything about your spouse’s spiritual
beliefs, routines, or rituals during this time? How has this affected you? How has the spouse’s spirituality affected the relationship with you?
9. If you could identify a sense of hope or support for yourself during this event what or who would it be?
   Probe Questions: If a sense of hope or support could be identified, how did this person or thing provide a sense of hope or support for you during this event
10. Of what we have discussed today, can you think of anything else healthcare providers could have done to assist you in the recovery experience in terms of spirituality?
   Probe Questions: How could healthcare providers assisted you in meeting your spiritual needs?
11. Is there anything else you would like to tell me about in regards to the recovery experience?
12. Is there anything else you would like to tell me about in regards to spirituality?
(For 2\textsuperscript{nd} data collection)
(For both Person with an MI and The Spouse/Partner)

1. It has been 3 months since our last meeting and you have had time to think about our last talk. Is there anything you would like to add to help me better understand the recovery experience at that time with either having an MI or living with someone who has had an MI. Maybe something you would like to add regarding how you felt during and after the heart attack and the changes that may have occurred to you or your spouse/partner. Can you tell me about how you handled or were handling the experience and any role spirituality may have played in your recovery experience or your spouse’s/partner’s recovery experience, including your relationship with one another. How do you feel about the future prognosis now? Has it changed since I last spoke with you? If so, what has happened to change your feelings?

2. Last time we talked about the emotions and feelings you experienced or were experiencing. What emotions or feelings are you experiencing at this time? How do they differ from what you felt the last time we talked? Since the last time we met, how has your life been affected or changed by this experience. Who or what has influenced that change?

3. Since the last time we talked, what has been the impact of your spiritual beliefs on your spouse/partner or the relationship with your spouse/partner?

4. Since the last time I was here, what has been the impact of your spouse’s/partner’s spiritual beliefs on you or the relationship with your spouse/partner?

5. Is there anything else you would like to tell me about in regards to the recovery experience?

6. Is there anything else you would like to tell me about in regards to spirituality?