THE RELATIONSHIP BETWEEN THE GRIEF PROCESS AND THE FAMILY SYSTEM: THE ROLE OF AFFECT, COMMUNICATION, AND COHESION

DISSERTATION

Presented to the Graduate Council of the University of North Texas in Partial Fulfillment of the Requirements For the Degree of

DOCTOR OF PHILOSOPHY

By

Elaine Schoka, M.S., L.P.A.

Denton, Texas August, 1999
Schoka, E. The relationship between the grief process and the family system: The role of affect, communication, and cohesion. Doctor of Philosophy (Clinical Psychology), August, 1999, 98 pp., 5 tables, 12 figures, references, 87 titles.

Sixty-six people who had recently experienced the death of a parent or a spouse completed a questionnaire packet to assess their current grief symptomatology and some characteristics of the relationships within their family. Participants were asked to fill out a questionnaire 4-5 weeks after the death and then again six months later. The present study compared two competing models to explain whether the grief process affects the characteristics of relationships within the family system or that family characteristics affect the experienced grief symptoms. Family characteristics included affect, communication and cohesion between the surviving members. Results from cross-lagged panel correlations found that increased family affect, cohesion and a person's total Family Environment Scale and FAM-III General scores, were significant predictors of less grief symptoms over time. A series of hierarchical multiple regressions found that when controlling for sociodemographic variables, grief at Time 1, and other predictors at Time 1 and Time 2, cohesion was a significant predictor of grief at Time 2. More cohesion at Time 1 lead to less grief at Time 2. No Time 2 family characteristics were significant predictors of Time 2 grief. When family characteristics were used as criterion variables, grief at Time 1 did not significantly predict family characteristics at Time 2.
THE RELATIONSHIP BETWEEN THE GRIEF PROCESS AND THE FAMILY SYSTEM: THE ROLE OF AFFECT, COMMUNICATION, AND COHESION

DISSERTATION

Presented to the Graduate Council of the University of North Texas in Partial Fulfillment of the Requirements For the Degree of

DOCTOR OF PHILOSOPHY

By

Elaine Schoka, M.S., L.P.A.

Denton, Texas

August, 1999
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>List</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>LIST OF TABLES</td>
<td>iv</td>
</tr>
<tr>
<td>LIST OF FIGURES</td>
<td>v</td>
</tr>
<tr>
<td>Chapter</td>
<td></td>
</tr>
<tr>
<td>I. INTRODUCTION</td>
<td>1</td>
</tr>
<tr>
<td>II. METHOD</td>
<td>27</td>
</tr>
<tr>
<td>III. RESULTS</td>
<td>37</td>
</tr>
<tr>
<td>IV. DISCUSSION</td>
<td>45</td>
</tr>
<tr>
<td>APPENDICES</td>
<td>61</td>
</tr>
<tr>
<td>REFERENCES</td>
<td>87</td>
</tr>
</tbody>
</table>
LIST OF TABLES

Table | Description | Page
-----|-------------|-----
1. | Means and Standard Deviations for Time 1 and Time 2 Variables Used in Analyses (N = 61) | 69
2. | Intercorrelations Among Sociodemographic, Predictor Variables and Time 2 Outcome Measures (N = 61) | 70
3. | Summary of Multiple Regression Analysis for Demographic Variables, Affect at Time 1 and Affect at Time 2 Predicting Grief at Time 2 (N = 61): Hypothesis 4 | 71
4. | Summary of Multiple Regression Analysis for Demographic Variables, Communication at Time 1 and Communication at Time 2 Predicting Grief at Time 2 (N = 61): Hypothesis 5 | 72
5. | Summary of Multiple Regression Analysis for Demographic Variables, Cohesion at Time 1 and Cohesion at Time 2 Predicting Grief at Time 2 (N = 61): Hypothesis 6 | 73
### LIST OF FIGURES

<table>
<thead>
<tr>
<th>Figure</th>
<th>Description</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Cross-Lagged Panel Correlation Model to Explain the Relationship Between Family Characteristics and Grief Symptoms</td>
<td>75</td>
</tr>
<tr>
<td>2.</td>
<td>Longitudinal Hierarchical Regression Model to Explain the Relationship Between Family Characteristics and Grief Symptoms</td>
<td>76</td>
</tr>
<tr>
<td>3.</td>
<td>Cross-Lagged Panel Correlation, Hypothesis #1: FAM-III Dyadic Affect</td>
<td>77</td>
</tr>
<tr>
<td>4.</td>
<td>Cross-Lagged Panel Correlation, Hypothesis #1: FAM-III General Affect</td>
<td>78</td>
</tr>
<tr>
<td>5.</td>
<td>Cross-Lagged Panel Correlation, Hypothesis #1: FES Affective Expression</td>
<td>79</td>
</tr>
<tr>
<td>7.</td>
<td>Cross-Lagged Panel Correlation, Hypothesis #2: FAM-III General Communication</td>
<td>81</td>
</tr>
<tr>
<td>8.</td>
<td>Cross-Lagged Panel Correlation, Hypothesis #3: FES Cohesion</td>
<td>82</td>
</tr>
<tr>
<td>9.</td>
<td>Longitudinal Hierarchical Multiple Regression Model to Explain the Relationship Between Family Characteristics and Grief Symptoms, Hypotheses 4-7</td>
<td>83</td>
</tr>
<tr>
<td>10.</td>
<td>Cross-Lagged Panel Correlation, Exploratory Analyses: Total FAM-III Dyadic</td>
<td>84</td>
</tr>
<tr>
<td>12.</td>
<td>Cross-Lagged Panel Correlation, Exploratory Analyses: Total FES</td>
<td>86</td>
</tr>
</tbody>
</table>
CHAPTER I

INTRODUCTION

Experiencing the death of someone close is a natural and expected part of life. We form attachments to others at the risk of experiencing grief when they die. Besides affecting us individually, death also occurs within a series of systems. From the systems of the greater society and community to the smaller system of the family, we interact with death at many levels. Just as the society as a system requires reorganization and the replacement of those individuals whose death has left a gap in the social order (Pinkenburg, 1995) we would expect that the family as a system has similar requirements. Society has greatly benefitted from the increased attention to understanding the grief process at the individual level. Unfortunately, there is an identified dearth of literature to explore the effects of a death within the family system (Bloch, 1991; Bowlby-West, 1983; Gelcer, 1983; Walsh & McGoldrick, 1991).

Grief is the process of mourning the loss of an attachment to an object. This study proposed to identify the relationship between the grief process and the family system in which it takes place. The grief process effects the family system and in turn, there are characteristics of the family system that affect the outcome of the grief process.

Many new studies are meshing family systems theories with grief and bereavement. Past research (Parkes, 1972; Pinette, 1975; Stroebe et al., 1993) suggests that the strength of the relationship between the griever and deceased person, as well as
The demographic characteristics of the deceased person, all affect the process of bereavement. The next step in this research is to investigate the relationship between the characteristics of the relationships within the family system and the grief process. The process of grief may be aided or hindered depending on the type of affect, openness of communication and level of cohesion in the relationships between the survivors. In addition, the grief process is affected by the roles that the deceased person filled in the life of the griever and whether these roles have been, or even can be, filled or re-allocated.

The purpose of this study was to investigate competing models to explain the relationship between the family system and the grief process. An attempt was made to explain how the death of a family member might effect the relationships, affect, communication, and cohesion within the family. The purpose of this study was also to identify how certain characteristics of the relationship within the family system might influence the current and future levels of symptomatology and grief. In sum, an attempt was made to investigate how the family system affects the experience of grief, and how the experience of grief effects the family system.

Attachment, Loss and Adjustment

According to attachment theory, human beings have a drive and desire to develop and maintain attachments with other human beings (Jacobs, Kosten, Kasl, Ostfeld, Berkman, and Charpentier, 1987). The development of an attachment to a person is necessary in order for survivors to experience loss and grief when that person dies. Attachment theory also implies that proximal and distal boundaries within a relationship are interrelated (Byng-Hall & Campbell, 1981). That is, with secure attachments within a
family, a member can explore other relationships further because he or she has a base to which to return. Here, attachment theory suggests that people grow and develop new, outside relationships within the safety of primary, usually family, attachments. Without a previous attachment to the deceased person, there are no feelings of loss, and therefore no grief process.

The loss of the attachment prompts many characteristics of grief, including separation anxiety, emotional bluntness and numbness, and despair and sadness. In assessing bereaved spouses, Jacobs et al. (1987) found that participants experienced loss along these four dimensions, which were developed on the basis of general attachment theory. The act of pining for the deceased is an essential aspect of grief that distinguishes it from other emotional distress (Jacobs et al., 1987). Much evidence suggests that separation or loss of attachments to others in the earlier years of development is related to subsequent emotional difficulties, including anxiety, depression, and suicide (Bowlby, 1979). Benoliel (1985) suggested that loss is a human experience that is both common and unique. Loss is common as it is experienced by all human beings. It is unique, as well, in that each person phenomenologically experiences loss through his or her own subjective perceptions. Although how we cope with loss is a reflection of our past experiences with loss, it is also a reflection of the cultural and social values and norms that are usually learned via the family system (Benoliel, 1985).

Adjustment to a loss is a process with many critical variables. Wortman, Silver, and Kessler (1993) developed a theoretical approach which suggests that the impact of a loss is for the most part determined by the person's ability to incorporate the loss into his
or her individual philosophical perspective or world view. When events like the death of a family member, violate a person's world view, the result is likely to cause a state of disequilibrium or distress. Wortman et al. (1993) suggest that a reinterpretation of the event or an attempt to alter the world view in order to accommodate the event may allow the person to reestablish equilibrium. Those that attempt to integrate the event but are unable to do so will continue to process the loss and will likely continue to experience related symptoms.

Although there are many factors that predict how a person adjusts to a loss, Benoliel (1985) suggests that two primary variables are the significance and importance of the attachment to the individual and the degree to which the relationship is replaceable. One of the variables that should affect the outcome of the grief process is the person's ability to compensate for the loss of an object and the relationships and roles which that object represented. Freud (1957) contributed the idea that the mourning process is successfully completed only if and when the survivor experiences a form of detachment from the deceased object (cited in Guttman, 1991). Only with detachment can subsequent new and meaningful attachments occur. Parkes (1972) developed a set of antecedent, concurrent, and consequent factors that could help predict how a person adjusts and adapts to a major loss. Antecedent factors include variables such as the relationship with the deceased and the mode of death, while concurrent factors include sex, age, personality, socioeconomic status and cultural and familial factors influencing grief expression. Influencing factors subsequent to the loss include social support or isolation and secondary stresses.
Mourning the attachment to someone is a process of restructuring our internal perceptions of the world and the people around us. It is moving from being in a role or relationship to the deceased to defining our world without that person physically present (Black, 1981). What we lose and grieve for is both the loss of a person and of a model or definition of the world around us. The deceased person takes with him or her certain roles and relationships of the survivors (Black, 1981).

People develop constructs of death to help with grief process and to help adjust to the loss of an attachment (Gray, 1988). Developing accounts of what happened, that is, interpreting events cognitively and emotionally brings about resolution of that event (Harvey et al., 1992). Harvey et al. (1992) found that this account-making, or developing a reasonable and believable definition of the situation, was significantly related to successful coping. Gamino, Sewell and Easterling (1995) also suggested that people use specific constructs in their belief system to help in the grief process. The end result is resolution, that is, utilizing these constructions of death to resolve feelings of grief.

Similarly, after a death, to aid in resolution and recovery, a person needs to reconstruct those vacated roles. They may either terminate that role (it will never be filled) or find a substitute object to fill that role (a new or previously known object). This proposal suggests that role re-construction will aid in the grief process.

**Family Systems Theory**

Since the 1950s and 1960s, there has been a great movement to develop a theory that explains the properties, interrelations, and behaviors of families. Utilizing a common family systems model or theory, we can explain or predict the actions and
reactions of families in different situations. The generally agreed upon family systems theory works on three basic concepts (Steinglass, 1984). First, the family works as a true, operational system. This premise suggests that the individuals within the system act in a consistent relationship with other members, and that the behavior of the family is best explained as a product of its organizational characteristics (Steinglass, 1984). Therefore, behavior is seen as a product of the various interactive relationships and organization within the family as a whole. The second concept suggests that families behave in a patterned and predictable way because they operate in a homeostatic or morphostatic fashion. Families tend to act in a way that moves toward a sense of balance and regulation of the system (Jackson, 1968; Steinglass, 1984). The third core concept states that families, as open systems, move toward greater complexity, growth and development. This increasing organizational complexity can occur only if the system has access to high quality information which is disseminated throughout the system. This concept is called systemic growth (Steinglass, 1984).

A major influence in the assessment and treatment of families has been Beavers’ (1981) model that describes and classifies the family system. Utilizing Beavers’ model, clinicians can obtain a very descriptive picture of the family and how they are likely to act and react to certain situations. The model describes families on two separate axes. The horizontal axis corresponds to the family’s structure, adaptive flexibility, and types of interactions within the family. The five areas of family behavior measured include structure, the family’s shared view of themselves, goal-directed negotiation, encouragement of individual autonomy, and affect or feeling issues. The vertical axis is
an expression of the style of the family, or how they relate to the outside world. This axis extends from the quality of being Centripetal, or inner oriented to the opposite end of the axis where the families are Centrifugal, or oriented outward. This axis describes how the family as a whole reacts to and relates with the outside world. When looking at both axes together, a clinician can develop a picture of a family that can be descriptive of its relative pathology. Families are assessed on their amount of adaptation on the horizontal axis (from Severely Disturbed all the way to Optimal) and the family's balance of cohesiveness on the vertical axis, with either extreme (overly Centripetal or overly Centrifugal) leading to pathological symptoms. Beavers' (1981) model allows us to identify the important characteristics of a family system, which include the family's communication, encouragement of autonomy, affect, flexibility, and the quality of interactions inside and outside the family. It is these characteristics of the family system which will both effect and be effected by the grief process.

Byng-Hall and Campbell (1981) refer to boundaries within the family as 'interpersonal distance' between the members of the family system. The authors explain the importance of the system to adjust the psychosocial distance between its members as development continues, especially through an instance like the death of a family member. All family functioning occurs within the context of this system of interpersonal bonds. In the conceptual formation of their study of "too-close/too-far" dyads within a family, Byng-Hall and Campbell (1981) reiterate the family systems theory. They suggest that while each dyad within a family can be flexible in its interpersonal distance, the distance
of that dyad affects the distance of all the other relationships in the family system and is, in turn, influenced by them.

Discussing the relevant theoretical features of his case studies of family bereavement, Bloch (1991) suggested three main family systems concepts. First, the whole (family) is greater than the sum of its parts (members). Second, the system tends more towards homeostasis. In accordance with this concept, the author suggests that the system will hold as long as the equilibrium prevails. The final concept states that the system must be able to withstand normal as well as extraordinary life events while continuing to move toward homeostasis (Bloch, 1991).

Two elements that have been identified as the major components of family growth are communication and boundaries. Distorted family communication is often seen as a source of psychopathology within the family (Jacob, 1988). Extra- and intra-family boundaries must maintain a balance of connectedness and integrity with flexibility and openness. In addition, the quantity and quality of verbal and non-verbal communication within the family system is crucial to the increasing and healthy growth and development of the system (Steinglass, 1984).

Applying these family systems concepts to stressful family situations, such as the illness of a family member, Kaplan, Smith, Grobstein, and Fischman (1973) suggest that the family has an important role in mediating the stress reactions of its members. Their study clinically reviewed families of critically ill children. The family systems model implies that individuals do not solve their distress independent of the family environment. The authors state that adaptive coping by the family offers the greatest protection from
increased and prolonged stress reactions and the best assurance that the family will continue as a viable system (Kaplan et al., 1973). The family system is seen as one of reciprocal relationships, in which each member provides mutual assistance to the other members. Their study found that, in situations where a family member failed to respond to what another considered a legitimate expectation, the inevitable resentment and dissatisfaction affected all other relationships in the system (Kaplan et al., 1973).

Applying these family systems concepts to the experience of a loss, Bloch (1991) posits that grieving family members both are influenced by and, in turn, influence the grief of other members. The literature regarding the effects of a family member's death on the family system is reviewed in a following section.

**Roles and Relationships of the Deceased**

When discussing the death of a family member it is important to identify the identity and role of the deceased in the family, and the relationships of the survivors to the deceased. Here we will review literature that investigate the deaths of each role within the family. These roles include death of a child, death of a parent, death of a spouse and death of a sibling. While each of these deaths are experienced differently by each of the survivors, the subsequent changes within the family, including the various roles and relationships, is universal. The literature reviewed here taps into the stress reactions as well as the recovery and coping of the families after the death of the family member.
Death of a child. Experiencing the death of a child has been identified as the most stressful event with which a person could potentially deal with (Holmes & Rahe, 1967) with subsequent recovery possibly becoming a lifelong task. In a study of ten bereaved mothers, Braun and Berg (1994) identified the theory-based processes that occur in order for meaning reconstruction to take place. The phases of discontinuity, disorientation, and adjustment aid in the recovery process of the bereaved mothers. The authors found that the ability to restore meaning after the death of a child was linked to a smoother reorientation toward the future and an adjusted life (Braun & Berg, 1994).

Ponzetti (1992) investigated the different reactions to the death of a child from the parents and the grandparents within the same family. While there were some similarities in the grief reactions between the parents and grandparents, the author found several differences important in understanding the family system. The author found that parents experienced greater symptoms that suggested a more intense emotional attachment existing between parents and children than between grandparents and their grandchildren. In addition, while parents' reactions were expectedly focused on the child, the concerns of the grandparents were more often focused on the grieving parents. This finding is quite interesting and provides some evidence to the importance of the family structure and system within the grief process (Ponzetti, 1992).

Many studies attempt to identify the grief reactions and subsequent adaptation of parents after the death of a child. After working with hundreds of families of child victims of cancer and cystic fibrosis, Soricelli and Utech (1985) theorized four distinguishable phases of grief initiating at the time of diagnosis and treatment. These
phases include: 1) bereavement, 2) integration, 3) renewed bereavement, and 4) postdeath mourning. These phases suggest that families experience similar patterns of processing the death and dying of a child within the family. In addition, the authors found that connecting the families to outside social support groups aided in their grief recovery (Soricelli & Utech, 1985). In a similar study of families of child cancer victims, Rando (1983) found evidence to suggest that parental bereavement takes a long-term course with similar phases of bereavement and anticipatory grief.

Death of a spouse. Conjugal bereavement includes a myriad of coping and adaptation patterns and bereaved spouses make up a much more heterogeneous group. Levy, Martinkowski and Derby (1994) provided evidence for the concept of the great variety of coping mechanisms in conjugal bereavement. The study provided additional evidence that self-reported coping behaviors are a more powerful predictor of quicker recovery than demographic, social support, or situational variables (Levy, Martinkowski, & Derby, 1994). Shuchter and Zisook (1987) suggested a more multidimensional model of spousal bereavement. In their model, conjugal bereavement has far more pervasive and far reaching effects in a survivor's life. The shock, anger and guilt come in relentless waves, often leading to a detached or dissociative state. In addition, many surviving spouses perpetuate solitude by continuing to maintain a relationship with their dead spouses, often blocking the process of detachment and closure. Last, the authors point out that with the death of a partner, all remaining relationships of the surviving parent are changed, especially within the family. As the family structure inevitably changes, often conflicts arise surrounding expectations of family members (Shuchter & Zisook, 1987).
Death of a parent. Many studies have provided evidence of the link between childhood experience of a deceased parent and development of psychopathology in later adult life, including depression and psychosis (Adam, Bouckoms, & Streiner, 1982; Breier, Kelsoe, Kirwin, Beller, Wolkowitz, & Pickar, 1988; Brown, Harris, & Bifulco, 1986; Finkelstein, 1988; Lyon & Vandenberg, 1989; Saler and Skolnick, 1992). Other than the development of adult psychopathology, early childhood parental death has also been linked to poor relationship skills and less happiness in later adult life (Guttman, 1991; Hepworth, Ryder, & Dreyer, 1984; Kaltreider, Becker, & Horowitz, 1984). Recently, the focus has turned to more proactive or interactive approaches to childhood parental bereavement. Lohnes and Kalter (1994) found that children tend to do better when they are able to perpetuate an emotional attachment to an internal representation of the deceased parent. The intervention, at a group level, is used to elicit thoughts, feelings and insights in a supportive and safe atmosphere. Still other approaches to childhood parental bereavement integrate the surviving family to aid in the adaptation of the child to the loss. Both Gray (1987) and Moody and Moody (1991) found that one of the most helpful actions the surviving parent can do is increase communication and listen to the grieving child. Providing age-appropriate, honest and useful information was also found to be particularly helpful to grieving adolescents (Gray, 1987). Younger children were found to benefit more from symbolic expressions of their feelings (Moody & Moody, 1991) such as through painting, drawing, or directed physical play.

Death of a sibling. Briefly looking at sibling bereavement, family relationships between the survivors often lead to unique, yet shared, grief experiences. Martinson and
Campos (1991) found that long-term, grieving adolescents were found to have some ability to develop and personally grow from the death of a sibling. While good communication in the family added to a more positive outlook on the experience, negative outlooks were associated with isolation from family, difficulty with being able to share one's feelings about death, and the inability to rely on family as a social support (Martinson & Campos, 1991).

In reviewing the effects of the death of certain, specific relationships (i.e, sibling, spouse, child, etc.) on individuals, one finds similarities and differences between these effects. One common effect that spans across these different relationships is the affectual process that a person goes through after the death. Almost all of the studies of different relationships have found similar phases of grief despite the type of relationship. These phases include shock and numbing, bereavement, disorientation or disorganization, a reorganization and adjustment. Another common effect appears to be that similar positive characteristics of the surrounding social network or family help the bereaved regardless of the type of relationship to the deceased. These positive characteristics include an increase in open, positive communication between the survivors and an increase in the sharing or showing of emotion and affect. There are also unique effects of the death of these relationships as well. One unique effect may be the idea that greater attachments lead to great loss. Therefore, if some relationships (i.e, parent-child) are seen as stronger attachments than others (i.e., siblings) then more intense grief reactions would be expected. Another unique effect is found in the age of the survivors. One example would be experiencing the death of a parent as a child versus experiencing the death of a
parent as an adult. People at different developmental stages of their life will experience
death and grief differently. Experiencing some deaths (i.e., death of a spouse, death of a
child) are relatively age dependent.

**Family Systems and Grief**

As pointed out earlier, after a death within a family system, all remaining
relationships are effected and changed in some fashion (Shuchter & Zisook, 1987).
Bowen (1978) suggests that "family systems theory provides a broader perspective of
death than is possible with conventional psychiatric theory, which focuses on death as a
process within the individual" (p. 92). Though obviously grief is experienced within a
person, the death of a family member must also be viewed from the family system
perspective in order to develop the most accurate picture of the family's ability to cope
and function.

While some authors focus on the negative physical health effects of experiencing
the slow death of a family member (Huygen, van den Hoogen, van Eijk & Smits, 1989),
social and emotional impacts have more often been the focus of the past research. In an
examination of grief as it was experienced in a family system, Kissane and Bloch (1994)
found examples of patterns of maladaptive responses utilized by families in hopes of
attaining equilibrium. Within the concept of the maladaptive responses originally
developed by Bowlby-West (1982) is the assumption of inappropriate roles, such as
parentification of a child. Also, sealing off family boundaries (not looking to fill roles
outside of the family) which produces greater enmeshment is another example of a
maladaptive approach by a family system. Studying families seven to nine years after the
death of a child from cancer, McClowry, Davies, May, Kulenkamp and Martinson (1987) found most families still experienced significant pain and loss. The authors identified three patterns of grieving which included "getting over it," "filling the emptiness," and "keeping the connection." Goldberg (1973) identified the family tasks required following the death of a family member which include the open allowance of mourning in the system, relinquishing memory of the deceased, and realignment of intra- and extra-familial roles.

The Effect of the Grief Process on the Family System

After studying the process and outcome studies of grief reactions following the death of certain family members and relationships, it is important to understand the qualitative changes within the family system as a whole goes through following a death. After the death of a family member, there are inevitable changes in the system that will take time to reach equilibrium. It is the period before equilibrium is reached and the changed final product of the family system that is a focus of this current proposal (Hansson, Carpenter & Fairchild, 1993). Shapiro (1994) explained the global and exhaustive effects of grief on the family succinctly, stating:

"Grief is a crisis of both attachment and identity, disrupting family stability in the interrelated domains of emotions, interactions, social roles, and meanings. Grief mobilizes a family's resources for managing intense emotions, reorganizing daily interactions, and redefining the identity of the complex, collaborative self" (p.17).

Meshing family systems theory and reviews of grief and bereavement research, some patterns can be identified as the process of system change.
**Homeostasis.** Bowlby-West (1982) suggests that a new homeostasis needs to be achieved to correct the void left by the death of a family member. This new homeostasis takes shape, often without the survivors knowledge or awareness (Bloch, 1991). How bereavement is experienced by the family members can influence the quality of the adjustment following the death. It is important to realize that to cope with a loss of an attachment, a survivor needs to experience oneself as changed and to actualize and instate a new identity of himself and the family (Bowlby-West, 1982). While there are several common homeostatic adjustments which may potentially occur, the most prominent and possibly detrimental include enmeshment of relationships, the development of family secrets (discontinued or pathological communication), idealization, infantilization (role reversals), replacements for the dead member, and restructuring. While some of these adjustments can possibly be beneficial, at least during the initial development, they can often develop into poor or harmful patterns of relationships (Bowlby-West, 1982). The idea behind the adjustment to homeostasis is that the family system needs to quickly find some substitute form of functioning in order to reestablish equilibrium (Bloch, 1991; Shapiro, 1994).

**Boundaries.** The balance of connectedness and self-assertion within the grieving family leads to the possibility of boundary difficulties. The continuum used when referring to boundaries is defined by extreme over involvement or enmeshment at one end and extreme isolation or disengagement at the other (Crosby & Jose, 1983; Shapiro, 1994). After the death of a family member, these normally reliable boundaries can become temporarily redefined, or even permanently skewed, to accommodate for
members of the system who either need additional connectedness (leading to enmeshment) or need more time to themselves, leading to disengagement (Shapiro, 1994). Boundaries, including patterns of authority and decision-making, are often blurred and disoriented after the death of a family member (Crosby & Jose, 1983). Goldberg (1973) suggested that increased solidarity was a more likely reaction of family members to the death of a fellow member.

**Affectivity.** Another change often found following the death of a family member is subsequent family discord and conflict within the surviving relationships. Bowlby-West (1982) suggests that these conflicts can be common, especially in spousal relationships, due to the personal and individual grief differences which become issues in the surviving relationship. Walsh and McGoldrick (1991) reviewed the past literature and made the observation that grieving the loss of a family member can precipitate rejection of other, surviving members. This rejection often occurs among spouses, especially in sexual behavior and intimacy. This change may even destroy existing relationships or personal effectiveness (Bowlby-West, 1982). Many studies have identified an increased stressor placed on the marital relationship after the death of a child. The stress of living through the death of a child often takes its toll in discord within the marital relationship and increased dissatisfaction and decreased sharing, which in many cases leads to the act or consideration of divorce (Dyregrov, 1990; Feeley & Gottlieb, 1988; Thomas & Striegel, 1995).

An important variable that can effect how relationships will be effected after the death of a family member is the type and level of affection between the survivor and the
deceased person. Guttman (1991) suggested that a negative relationship with a parent when that parent dies can often lead to surviving relationships becoming the focus of that anger and hate.

Another possible reaction is what Bowen (1978) described as an "emotional shock wave" that affects the family after a member has died. This shock wave works through the emotional dependence of family members on each other and consists of the family's desire to deny the connectedness of experienced losses; the family therefore, continues to isolate itself and denies any emotional reaction.

**Structural change.** Shapiro (1994) identifies two different dimensions of structural changes experienced by a grieving family. First, members often have impaired functioning in family roles, caused by loss of the person or by the survivors' incredible grief. Second, the loss of homeostasis through the death of a stabilizing member or one who maintained the equilibrium or homeostasis within the family.

Lamberti and Detmer (1993) utilize Minuchin's (1974) model which posits that the structure relies on subsystems within a family, mainly based on spousal, parental, and sibling. Role flexibility or rigidity within a family (strict adherence to defined roles) becomes a problem when a family member dies. Less functional families try to change as little as possible, wanting to keep things as before. More functional families, those who had more flexibility in their roles, can accommodate without one person having to assume the role of the deceased. It is this reorganization that aids the family. Bowen's (1988) model is similar, but it augments Minuchin's. Bowen adds the notion of transgenerational grief and that transmitted patterns of grieving occur within an extended family.
Minuchin suggests that after the death of a family member, there is a structural reorganization (Lamberti & Detmer, 1993). That is, if a parent dies, someone who is appropriate needs to fill the role. Sometimes children are brought into the parent role, which Minuchin suggests will cause trouble and distress. Similarly, an adult should fill the vacated spousal subsystem. With the death of a child, the surviving siblings are likely to rearrange hierarchy and redefine who has specific roles. Having one child subsuming all of the vacated roles should be avoided. "Replacing" a deceased sibling adds a lot of additional burden on the sibling, and may cause the loss of his/her own identity, suggests Minuchin (cited in Lamberti & Detmer, 1993). Bowen’s model is more concerned with how the family system is processing grief rather than the structure and the model identifies multigenerational patterns of grief. Individual expression of grief is encourage to avoid extreme togetherness, fusion, or enmeshment. For both Minuchin and Bowen the desired ends are similar: to achieve a reorganized family system that has experienced at least minimal resolution of grief, and restoring functioning at least at pre-death level (Lamberti & Detmer, 1993).

Role reallocation. An important aspect of family recovery after the death of a member is role reallocation following the death (Crosby & Jose, 1983; Goldberg, 1973; Shapiro, 1994). Physical and emotional changes are experienced after the death of a family member. Surviving members must deal with the fact that their loss affects other surviving relationships, especially inside the family. The structure of the family changes, and the surviving members may have to take on and fill the roles of the deceased (Shuetter, 1986). These roles may be physical, such as making breakfast or being the
primary wage earner, or they may be emotional, such as the favorite son or the one that always makes jokes. Vess, Moreland and Schwebel (1985) identify the important differences between person-oriented families and position-oriented families. Person-oriented families tend to have more open communication, achieved roles, and flexible power structure, while position-oriented families tend to have more closed communication, ascribed roles, and rigid power structure. Vess et al. (1985) predict that person-oriented families will more effectively reallocate family roles and, therefore, experience less stress and grief symptomatology than more position-oriented families. Vollman, Ganzert, Picher and Williams (1971) suggest that the ability of the family to reallocate or reapportion the roles once occupied by the deceased in a just and equitable manner is the single most important factor in a family system's grief experience and recovery process. Walsh and McGoldrick (1991) point out that, after the death of a family member, reorganization of the family system and reinvestment in other relationships is a major family adaptational task.

The Family Systems' Effect on the Grief Process

Many studies identify the important variables that could influence the family experience of a death of a member. The variables that have been shown to influence the grief process the most will be utilized and evaluated in this current study. These variables include: family communication (Bowen, 1978), family boundaries, amount of family discord or distress, flexibility of the power structure, and the experienced or perceived amount of affection shown (Vess et al., 1985; Walsh & McGoldrick, 1991). These variables can predict better coping processes and possibly less symptomatology. Less
symptomatology has been related to increased communication (Bowlby-West, 1982) especially in expression of feeling states. Zisook (1987) suggested that competent family interaction was one predictor of a positive outcome and less symptomatology.

Unfortunately, the current quasi-experimental research on how the family system affects the grief process is sparse and mainly theoretical (Kristjanson, 1991). Much of the literature reviewed here are conceptual papers or studies that evaluate qualitative data (Bowlby-West, 1982; Gelcer, 1983; Lamberti & Detmer, 1993; Rosenblatt, 1993; Vess et al., 1985). There have been calls from the past research to systematically study the influence of the family system. Many authors point toward evaluating grief in a family system as a crucial next step in the literature. Zisook (1987) suggests that future research should focus on process and outcomes because "...studies of the response of the family as a unit to the death of a member are quite limited" (p.135). In addition, Walsh and McGoldrick (1991) highlighted the paucity of family literature with a systemic view of loss since the ground breaking works of Bowen. When suggesting what future studies should focus on, there are some differences.

Some studies (Feeley & Gottlieb, 1988; Kissane & Bloch, 1994; Lehman, Wortman & Williams, 1987) encourage future research to identify if there are any changes, good or bad, in the lives of grieving individuals and families over time, instead of strictly focusing on the current levels of distress. Others suggest continuing to focus on strengthening the instruments used to measure the outcomes of grief (Davies, Spinetta, Martinson, McClowry & Kulenkamp, 1986; Zisook & Devaul, 1984). Still others (Bloch, 1991; Bowlby-West, 1983; Gelcer, 1983; Lamberti & Detmer, 1993)
suggest that research merely needs to consistently view the mourning and grief process through the family system. Last, there is a strong push to utilize more longitudinal designs to provide more information than the "snapshot" designs of previous research (Hansson, Carpenter & Fairchild, 1993).

An important goal for this current study was to augment the current literature and to provide additional information and insight into the functioning of the family system. Much of the previous research has been static in its approach to assessing the family system. There is a true lack in assessing the changes in the system that occur over time. This current study investigated the changes in both symptomatology and the quality of the family system via a six-month longitudinal study. In addition, this study was also unique in that it assessed these changes on valid, reliable, and standardized assessments of family functioning and grief symptoms, as opposed to qualitative interview or case study data utilized in previous research. The measures used in this study assessed some of the important family constructs found in the literature reviewed earlier (Bloch, 1991; Bowen, 1978; Bowlby-West, 1983; Davies et al., 1986; Goldberg, 1973; Sandler et al., 1992; Vess et al., 1985). It was theorized that relationships within the family systems would have to change along the important system constructs described above, including communication, family closeness and affectivity, and cohesion, in response to the loss. These family characteristics will also serve as important benchmarks in grief process as well. As a final original contribution to this field of research, this study compared the ability of two causal models to explain the relationship between the family system and the grief process.
Hypotheses

The death of a family member and the subsequent grief process changes the surviving relationships within the family system. In addition, there are characteristics of the family system, at the time of the death, that will effect the grief process. It was hypothesized that there is a relationship between the grief process and the relationships in the family system. Seven hypotheses were tested.

**Hypothesis 1.** It was hypothesized that individuals who viewed the relationships within their family as having more positive affective involvement and affective expression at Time 1 would experience less grief symptoms at Time 2. Participants' scores on the Family Assessment Measure - Third Edition (FAM-III) (Skinner, Steinhauer & Santa-Barbara, 1984) General and Dyadic Affective Involvement subscale and the Family Environment Scale (FES) (Moos & Moos, 1994) Affective Expressiveness subscale were used to measure affect. Higher scores on the measures of affect indicated that participants felt more comfortable sharing their feelings within their family. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief.

**Hypothesis 2.** It was hypothesized that individuals who viewed the relationships within their family as having more open communication at Time 1 would experience less grief symptoms at Time 2. Participants' scores on the Family Assessment Measure - Third Edition (FAM-III) (Skinner, Steinhauer & Santa-Barbara, 1984) General and
Dyadic Communication subscale were used to measure communication within the relationship. Higher scores on the measures of communication indicated that participants believed that they were able to discuss important thoughts with their family and felt listened to by their family. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief.

**Hypothesis 3.** It was hypothesized that individuals who viewed the relationships within their family as having more cohesion at Time 1 would experience less grief symptoms at Time 2. Participants’ scores on the Family Environment Scale (FES) (Moos & Moos, 1994) Cohesion subscale were used to measure cohesion within the family relationship. Higher scores on the measures of cohesion indicated that participants felt strongly attached to members of their family, and that family members could rely on one another. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were be used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief.

Expounding on these first three hypotheses, four additional hypotheses were tested as more specific explanations of the relationship between the family system relationships and the grief process. These additional four hypotheses also utilized more stringent statistical analyses.

**Hypothesis 4.** It was hypothesized that as affect at Time 2 increased, it would have a direct effect of decreasing the experienced grief symptoms at Time 2. In addition, affect at Time 1 would have an indirect effect of decreasing experienced of grief
symptoms at Time 2, as mediated by sociodemographic variables, grief at Time 1 and other family characteristics at Time 1. Participants' scores on the Family Environment Scale (FES) (Moos & Moos, 1994) Affective Expression subscale and scores on the Family Assessment Measure - Third Edition, General (FAM-III) (Skinner, Steinhauer & Santa-Barbara, 1984) Affective Involvement subscale were used to measure affect. Higher scores on the measures of affect indicated that participants felt more comfortable sharing their feelings within their family. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief.

**Hypothesis 5.** It was hypothesized that as communication at Time 2 increased, it would have a direct effect of decreasing the experienced grief symptoms at Time 2. In addition, communication at Time 1 would have an indirect effect of decreasing the experienced grief symptoms at Time 2, as mediated by sociodemographic variables, grief at Time 1 and other family characteristics at Time 1. Participants' scores on the Family Assessment Measure - Third Edition (FAM-III) (Skinner, Steinhauer & Santa-Barbara, 1984) General Communication subscale were used to measure communication within the family relationships. Higher scores on the measures of communication indicated that participants believed that they were able to discuss important thoughts with their family and felt listened to by their family. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief.
Hypothesis 6. It was hypothesized that as cohesion at Time 2 increased, it would have a direct effect of decreasing experienced grief symptoms at Time 2. In addition, cohesion at Time 1 would have an indirect effect of decreasing the experienced grief symptoms at Time 2, as mediated by sociodemographic variables, grief at Time 1 and other family characteristics at Time 1. Participants’ scores on the Family Environment Scale (FES) (Moos & Moos, 1994) Cohesion subscale were used to measure cohesion within the family relationship. Higher scores on the measures of cohesion indicated that participants felt strongly attached to members of their family, and that family members could rely on one another. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief.

Hypothesis 7. It was hypothesized that those who experienced more grief symptoms at Time 1 would experience more grief symptoms at Time 2. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief.
CHAPTER II

METHOD

Participants

Sixty-six recently bereaved people were recruited from a variety of sources. Of the 66 participants that filled out questionnaires at Time 1, 61 went on to also complete questionnaires at Time 2. Every participant experienced the death of a parent or spouse within the prior four to five weeks. The relationships assessed in the surviving family were either a parent-child relationship or a spousal relationship. The participants ranged in age from 21 - 75 years old (mean = 46.8, SD = 11). Of the 66 participants, 22 (33%) were male and 44 (66%) were female; 54 (82%) were Caucasian and 12 (18%) were non-Caucasian; 61 (92%) were of a Christian faith and 5 (8%) were of a non-Christian faith or did not identify with particular religion.

When asked about their current marital status, 45 (68%) indicated that they were currently married or in a significant committed relationship while 21 (32%) reported that they were not currently in a significant relationship. For education, 11 (17%) had a High School education, 29 (44%) had some college, and 26 (39%) had graduated from college or had some graduate school work.

Of the 66 participants of this sample, 7 (11%) had a household income less than $25,000 per year, 35 (53%) had a household income between $25,000 and $75,000 per year, and 21 (32%) had a household income over $75,000 per year. Finally, when asked
about previous experiences with the death of someone close, of this sample 23 (35%) had 
experienced the death of more than one person close to them prior to this most recent 
death, 33 (50%) had experienced one person close to them die prior to this most recent 
death, and 10 (15%) had never experienced the death of someone close to them prior to 
this most recent death.

Participants were recruited from a variety of different sources. Participants were 
recruited from contacts with funeral homes and funeral directors; charitable and non-
profit social organizations; churches and church leaders; “word of mouth,” verbal 
communication about the project; a still active internet website (www.flash.net/~jct0002) 
designed exclusively to describe the study and the author; as well as notices posted to a 
variety of internet interest groups.

All of the participants in this study recently (within 4-5 weeks) experienced the 
death of a parent or spouse, and then were asked questions about the family relationships 
as a whole as well as a current parent-child or spousal dyadic relationship. Of the 66 
participants, 27 (41%) experienced the death of his or her father, 27 (41%) experienced 
the death of his or her mother, 3 (5%) experienced the death of his wife and 9 (13%) 
experienced the death of her husband, therefore, of the whole sample 82% experienced 
the death of a parent and 18% experienced the death of a spouse. When given the dyadic 
form of the FAM-III, participants were asked to refer to a current relationship with a 
living parent or spouse. When referring to the surviving dyadic relationship, 13 (20%) 
referred to the relationship with his or her father, 12 (18%) referred to the relationship 
with his or her mother, 10 (15%) referred to his relationship with his wife, 16 (24%)
referred to her relationship with her husband, 6 (9%) referred to the relationship with his or her son and 7 (11%) referred to the relationship with his or her daughter.

**Measures**

The measures used in this study included a questionnaire for demographic, background and situational information (Developed by the author); the Grief Experience Inventory (GEI) (Sanders, C.M., Mauger, P.A., & Strong, P.N., 1985); the Family Environment Scale (FES) (Moos and Moos, 1994); and the Family Assessment Measure - Third Edition General and Dyadic forms (FAM-III) (Skinner, Steinhauer, and Santa-Barbara, 1984).

In this study, the measures of the relationships within the family system and the measures of the grief symptomatology acted as either the independent (predictor) or the dependent (criterion) variables depending on the hypothesis in question. Having these scales as both the independent and dependent variables was necessary to help identify the most appropriate model to explain the relationship between the grief process and the family system.

**Demographic questionnaire.** Participants were queried on a variety of sociodemographic factors including age, gender, race/ethnicity, marital status, education, religious affiliation, occupation, income, family constellation, and information about the deceased person. The effects of gender, income, education, age and marital status were controlled for in the hierarchical multiple regressions to determine predictors of family characteristics and grief symptoms at Time 2.
**Grief Experience Inventory.** The GEI is a 104-item true-false self-report scale that measures different qualities of the phenomenology of grief after experiencing bereavement. The assessment consists of three validity scales, six bereavement scales, and six research scales. The six bereavement scales include despair, anger, social isolation, loss of control, somatization, and death anxiety. The six research scales include sleep disturbance, loss of appetite, loss of vigor, physical symptoms, optimism/despair, and dependency. The alpha internal consistency for the scales have been reported to range from .52 to .84. Test-retest reliability was reported to range from .52 to .87 (Gabriel & Kirschling, 1989; Hansson, Carpenter & Fairchild, 1993; Sanders, Mauger & Strong, 1985). Total scores on the GEI were used to assess the grief symptoms experienced. Total scores were comprised of the sum of the bereavement scales.

**Family Environment Scale.** The FES is a 90-item, true-false scale that evaluates the social environment characteristics of all types of families. There are ten subscales assessing three broad domains of the family system. The domains assessed are the interpersonal relationships among family members, personal growth characteristics emphasized by the family, and the system organizational features of the family. The variables assessed in the subscales include cohesion, affective expressiveness, and conflict under the relationship dimension, independence, achievement orientation, intellectual-cultural orientation, active-recreational orientation, and moral-religious orientation under the personal growth dimension, and organization and control under the system maintenance dimension. Coefficient alphas have been reported to range from .61 to .78 across the ten subscales. Average test-retest reliabilities were reported to range
from .68 to .86. Average intercorrelation among subscales has been reported in the low to moderate range of .25. Construct validity has received support from the scale's ability to discriminate disturbed from non-disturbed families (Grotevant, 1989; Jacob & Tennenbaum, 1988; Moos & Moos, 1994; Moos, 1990; Roosa & Beals, 1990; Touliatos, Perlmutter & Strauss, 1990). The Affective Expression subscale was one of the measures used to evaluate the variable of affect within a family system. The Cohesion subscale was the measure used to evaluate the cohesion with a family system.

Family Assessment Measure - Third Edition. The FAM-III is a measure of family strengths and weaknesses based theoretically on the Process Model of Family Functioning, which is an elaboration of the McMaster Model of Family Functioning (cited in Grotevant, 1989; Jacob & Tennenbaum, 1988). The FAM-III has a General form that assesses the family as a whole, and a Dyadic form that assesses a particular dyadic relationship within the family (e.g., parent-child; husband-wife, etc.) When given the dyadic form, participants were asked to refer to a current relationship with a living parent or spouse. The FAM-III is often used to differentiate families that are coping successfully from those whose coping styles are dysfunctional. It is a 92-item self-report which uses seven subscales to evaluate different constructs. These constructs include task accomplishment, role performance, communication, affective expression, affective involvement, control and values and norms. There are two additional subscales that assess response style biases. Alpha internal consistency has been reported at .93 for the general scale and .87 for the dyadic scales that will be used in this study.

Intercorrelations among subscales ranged from .39 to .70 on the general scale and .43 to
.78 on the dyadic scale (Jacob & Tennenbaum, 1988; Grotevant, 1989). The FAM-III General form and Dyadic form were both used in this study. The General Affective Involvement subscale and Dyadic Affective Involvement subscale were one of the measures used to evaluate the affect within a family system. The General Communication subscale and the Dyadic Communication subscale were the measures used to evaluate the communication within a family system.

**Procedure**

The principal investigator contacted the perspective participants via e-mail or by phone, and explained the reason and course of this current study. The participants were notified that they could leave the study at any time without any penalty. In addition, issues about the confidentiality of this study and the sensitive information that was gathered were also identified and discussed. Participants were asked to fill out a questionnaire packet. The packet consisted of a cover letter (see Appendix A), a consent form (see Appendix B), demographic questions (see Appendix C), and the three self-report measures listed above. The researcher provided a pre-paid envelope in which the participant returned the packet. The self-report measures utilized were: the demographic questionnaire, the Grief Experience Inventory (GEI) (Sanders, C.M., Mauger, P.A., & Strong, P.N., 1985), the Family Environment Scale (FES) (Moos and Moos, 1994), and the Family Assessment Measure - Third Edition (FAM-III) General and Dyadic forms (Skinner, Steinhauer, & Santa-Barbara, 1984) The investigator explained to the participants that she would be available by e-mail or by collect call to answer any questions. When the participants returned their Time 1 questionnaire, the investigator
mailed them a thank you letter confirming the receipt of their questionnaires and thanking them for their participation. At any indication of increased anxiety, distress, or arousal of sadness due to completing the packet and outside what might have been expected for a family member, participants would have been offered counseling sessions with third and fourth year graduate students at the University of North Texas Psychology Clinic. There were no participants that met this criteria. Participants were asked if they would be willing to be contacted in the future to share their thoughts and experiences again. Those who agreed were contacted again six months after filling out the questionnaire packet from Time 1. The same briefing, explanation, debriefing, and safety precautions used at Time 1 were replicated for Time 2. Upon receipt of a Time 2 questionnaire packet, the principal investigator mailed the participant an additional thank you letter, indicating receipt of his or her packet, thanking him or her again for participating, and projecting a time when a copy of the overall, general results would be mailed to the participant.

Data Analysis

Research Design

The purpose of this study was to investigate two different causal models to explain the relationship between the family system and the grief process. This study explain how the death of a family member might effect the affect, communication, and cohesion within the family and identified how certain characteristics of the relationships within the family system influenced the current and future levels of symptomatology and grief. This study first used the affect, communication and cohesion of the relationships within the family as the independent variables to predict the future levels of grief.
symptoms. The first independent variable of affect was measured by the Affective Involvement subscales on the FAM-III (Skinner, Steinhauer & Santa-Barbara, 1984), General and Dyadic forms, and by the Affective Expression subscale of the FES (Moos & Moos, 1994). The second independent variable of communication was measured by the Communication subscale on the FAM-III (Skinner, Steinhauer & Santa-Barbara, 1984) General and Dyadic forms. The third independent variable of cohesion was measured by the Cohesion subscale on the FES (Moos & Moos, 1994). The dependent variable of grief symptoms was measured by the total score on the GEI. The GEI was chosen over the Texas Revised Inventory of Grief (TRIG) (Faschingbauer, Zisook & DeVaul, 1987) because the GEI has been identified as a more research oriented tool with more clearly operationalized and delineated subscales with good reliability and validity. The TRIG has been reviewed previously as a measure with more appropriate applications in clinical settings (Gabriel & Kirschling, 1989; Hansson et al., 1993).

**Statistical Analyses of Hypotheses**

The seven hypotheses were tested by evaluating two causal models. Both models attempted to accurately describe the causal relationship between the characteristics of the relationships within the family system and the grief symptoms. The main goal of both models was to account for as much variance in the relationships between the family system and grief symptoms as possible.

The first model (see Figure 1) analyzed was a cross-lagged panel correlation (CLPC). A CLPC was used to compare the correlations between symptomatology and family system characteristics within Time 1 and within Time 2 (synchronous
correlations), between Time 1 and Time 2 within each variable separately (autocorrelations) and between Time 1 and Time 2 between variables (cross-lagged correlations). These comparisons helped determine the direction of the causation between the symptomatology and the characteristics of the family (Locascio, 1982; Markus, 1979; Mayer & Carroll, 1987). The null hypothesis tested by the equality of the cross-lags states that the relationship between the two variables is due to some unmeasured third variable and not causation (Kenny, 1975, 1979).

The CLPC can provide additional evidence in explaining the causal nature of the relationship between these two variables. One of the benefits of utilizing a CLPC is an increased ability to study the dynamics of adjustment (Baltagi, 1993). Kenny and Harckiewicz (1979) cautions researchers in the application of the CLPC, and some of its limitations. Some criticisms of the CLPC model include the need for synchronous correlations to be at least .30, the need for a large sample size, and the assumption that there is a theoretical basis for the stationarity of the causal process. When using the CLPC method, it is first analyzed for the equality of synchronous correlations to test for stationarity and then the equality of crosslags to test for spuriousness. In the analysis of the CLPC, by comparing the cross-lagged correlations, it is assumed that the causal relationship is detected. Kenny (1975, 1979) suggests utilizing the Pearson-Filon test to test the significance of the differences between the cross-lags. The equation is presented here as cited in Kenny (1975, 1979):

Let 1, 2, 3 and 4 be variables, N be sample size and 
\[ k = (r_{12} - r_{24}r_{14}) (r_{34} - r_{24}r_{23}) + \\
(\frac{r_{13} - r_{12}r_{23}}{2})(r_{24} - r_{12}r_{14}) + (\frac{r_{12} - r_{13}r_{23}}{2})(r_{34} - r_{13}r_{14}) + (r_{13} - r_{14}r_{34})(r_{24} - r_{23}r_{23}) \]
The following then has approximately a standard normal distribution:

\[
Z = \frac{(N)^{1/2}(r_{14} - r_{25})}{[(1 - r_{14}^2)^2 + (1 - r_{25}^2)^2 - k]^{1/2}}
\]

After using the CLPC model in Hypotheses 1, 2 and 3, then the second model was tested. The second model (see Figure 2) analyzed was a longitudinal hierarchical multiple regression model. Hypotheses 4 through 7 tested different paths of this model. The second model was tested using a series of hierarchical multiple regressions. This second model was used, after the CLPC, as a more stringent and specific description of the relationships between family system relationship characteristics and the grief process. The multiple regression model takes into account the effects of sociodemographic (exogenous) variables and intermediate (endogenous) variables (affect, communication and cohesion) on the criterion variable (grief symptoms). In addition, the longitudinal hierarchical multiple regression model can assess the differences between using grief as the criterion variable and using Time 2 family characteristics as the criterion variables. A multiple regression model also accounts for the reciprocal causation between the intermediate variables and the criterion variable (Anderson, 1987). In general, the hierarchical multiple regressions utilize a series of linear regression equations to test an assumed causal order of variables. Results are evaluated using standardized partial regression coefficients (beta weights) to estimate the direct effect of each independent variable on the criterion variable (Blalock, 1985; Loehlin, 1992; Sprang, McNeil & Wright, 1992).
CHAPTER III

RESULTS

Findings From Descriptive Analyses

Descriptive analyses show that there were no extreme ranges found in the means or standard deviations in the variables used in these analyses (see Table 1). Before hypotheses were tested, correlations were conducted among all of the sociodemographic, Time 1 predictor variables and Time 2 criterion variables (see Table 2). There were no consistently significant correlations between sociodemographic variables and predictor variables. Income was the sociodemographic variable with the most significant correlations with other variables. Income was significantly negatively correlated with grief symptoms at Time 1 ($r(61) = -.41, p < .01$), however, was weakly correlated at Time 2 ($r(61) = -.14, p < .23$). The strongest correlations occurred between predictor variables, including FAM-III Affect and Communication (Time 1: $r (61) = .86, p < .001$; Time 2: $r (61) = .79, p < .001$) and FES Affect and Cohesion (Time 1: $r (61) = .75, p < .001$; Time 2: $r (61) = .70, p < .001$).

Findings From Hypothesis-testing Analyses

Hypotheses one, two and three were analyzed by six separate Cross-lagged Panel Correlations (three for hypothesis 1, two for hypothesis 2, and three for hypothesis 3). Hypotheses four, five, six and seven were analyzed by a series of hierarchical multiple regression equations.
Hypothesis 1. It was hypothesized that individuals who viewed the relationships within their family as having more positive affective involvement and affective expression at Time 1 would experience less grief symptoms at Time 2. The effects of affective involvement and expression on the experience of grief symptoms were tested by the cross-lagged panel analyses in Figures 3, 4, and 5. Three separate subscales, FAM III Dyadic Affective Involvement, FAM III General Affective Involvement, and FES Affective Expression, were used for measuring affect. Higher scores on the measures of affect indicated that participants felt more comfortable sharing their feelings within their family. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief. Results of the cross-lagged panel correlation found that the cross-lagged correlation of FAM-III General affect at Time 1 and grief at Time 2 was significantly larger than the cross-lagged correlation of grief at Time 1 and FAM-III General affect at Time 2 ($Z = -1.75, p < .01$). Therefore, Hypothesis 1 was supported.

Hypothesis 2. It is hypothesized that individuals who viewed the relationships within their family as having more open communication at Time 1 would experience less grief symptoms at Time 2. The effects of more open communication on the experience of grief symptoms were tested by the cross-lagged panel analyses in Figure 6 and 7. Two separate subscales, FAM III Dyadic Communication and FAM III General Communication, were used for measuring communication. Higher scores on the measures of communication indicated that participants believed that they were able to
discuss important thoughts with their family and felt listened to by their family. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief. Results of the cross-lagged panel correlation found that the cross-lagged correlation of FAM-III General communication at Time 1 and grief at Time 2 was significantly larger than the cross-lagged correlation of grief at Time 1 and FAM-III General communication at Time 2 ($Z = -1.45, p < .05$). Therefore, Hypothesis 2 was supported.

**Hypothesis 3.** It was hypothesized that individuals who viewed the relationships within their family as having more cohesion at Time 1 had would experience less grief symptoms at Time 2. The effects of more cohesion on the experience of grief symptoms were tested by the cross-lagged panel analysis in Figure 8. The FES Cohesion subscale was used to measure the family characteristic of cohesion. Higher scores on the measures of cohesion indicated that participants felt strongly attached to members of their family, and that family members could rely on one another. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were be used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief. Results of the cross-lagged panel correlation found that the cross-lagged correlation of FES Cohesion at Time 1 and grief at Time 2 was significantly larger than the cross-lagged correlation of grief at Time 1 and cohesion at Time 2 ($Z = -2.34, p < .01$). Therefore, Hypothesis 3 was supported.
Four additional hypotheses were tested to explore specific explanations of the relationship between the family system characteristics and the grief process.

**Hypothesis 4.** It was hypothesized that as affect at Time 2 increased, it would have a direct effect of decreasing experienced grief symptoms at Time 2. In addition, affect at Time 1 would have an indirect effect of decreasing the experience of grief symptoms at Time 2, as mediated by sociodemographic variables, grief at Time 1 and other family characteristics at Time 1. Participants' scores on the Family Assessment Measure - Third Edition (FAM-III) (Skinner, Steinhauer & Santa-Barbara, 1984) General, Affect subscale and the Family Environment Scale (FES) (Moos & Moos, 1994) Affective Expression subscale, were used to measure affective expression and involvement. Higher scores on the measures of affect indicated that participants felt more comfortable sharing their feelings within their family. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief. The effects of more affect on the experience of grief symptoms were tested by the longitudinal regression model in Figure 9. As seen in the hierarchical multiple regression analysis in Table 3, when controlling for the effects of sociodemographic variables, grief at Time 1 and other Time 1 and Time 2 predictor variables, neither Time 1 nor Time 2 affect were significant predictors of grief at Time 2. Therefore, no parts of Hypothesis 4 were supported.

**Hypothesis 5.** It was hypothesized that as communication at Time 2 increased, it would have a direct effect of decreasing experienced grief symptoms at Time 2. In
addition, communication at Time 1 would have an indirect effect of decreasing experienced grief symptoms at Time 2, as mediated by sociodemographic variables, grief at Time 1 and other family characteristics at Time 1. Participants scores on the Family Assessment Measure - Third Edition General, communication subscale (FAM-III) (Skinner, Steinhauer & Santa-Barbara, 1984) were used to measure communication within the family relationship. Higher scores on the measures of communication indicated that participants believed that they were able to discuss important thoughts with their family and felt listened to by their family. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief. The effects of more communication on the experience of grief symptoms were tested by the longitudinal multiple regression model in Figure 9. As seen in the hierarchical multiple regression in Table 4, when controlling for the effects of sociodemographic variables, grief at Time 1, and other Time 1 and Time 2 predictor variables, neither Time 1 nor Time 2 communication were significant predictors of grief at Time 2. An unusual finding was the direction of the effects of communication at Time 1. More communication at Time 1 predicted more grief at Time 2 (Beta = .30, p < .21), although not at a significant level. Therefore, Hypothesis five was not supported.

Hypothesis 6. It was hypothesized that as cohesion at Time 2 increased, it would have a direct effect of decreasing experienced grief symptoms at Time 2. In addition, cohesion at Time 1 would have an indirect effect of decreasing experienced grief symptoms at Time 2, as mediated by sociodemographic variables, grief at Time 1 and
other family characteristics at Time 1. Participants scores on the cohesion subscale of the Family Environment Scale (FES) (Moos & Moos, 1994) were used to measure cohesion within the family relationship. Higher scores on the measures of cohesion indicated that participants felt strongly attached to members of their family, and that family members could rely on one another. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief. The effects of more cohesion on the experience of grief symptoms were tested by the longitudinal multiple regression model in Figure 9. As seen in the hierarchical multiple regression in Table 5, when controlling for the effects of sociodemographic variables, grief at Time 1, and other Time 1 and Time 2 predictor variables, Time 2 cohesion was not a significant predictor of grief at Time 2. However, Time 1 cohesion was a significant predictor of grief at Time 2 (Beta = - .46, p < .05), suggesting that cohesion increasing at Time 1 was a significant predictor of less grief symptoms at Time 2. Therefore, some of the predictions in Hypothesis 6 were supported.

**Hypothesis 7.** It was hypothesized that those who experienced more grief symptoms at Time 1 would experience more grief symptoms at Time 2. Total scores on the Grief Experience Inventory (GEI) (Sanders, Mauger & Strong, 1985) were used to measure grief symptoms. Higher scores on the GEI indicated that participants experienced more intense feelings of grief. The relationship between Time 1 and Time 2 grief symptoms were tested by the longitudinal multiple regression model in Figure 9. When controlling for the effects of sociodemographic variables and Time 1 and Time 2
predictor variables, Time 1 grief was a significant predictor of Time 2 grief (Beta = .52, p < .001) suggesting that more grief symptoms at Time 1 was a strong predictor of grief symptoms at Time 2. Therefore, Hypothesis 7 was supported.

Findings From Exploratory Analyses

The purpose of this project was to attempt to understand the relationship between the grief process and characteristics of the family system. That is, do family characteristics affect grief symptoms or do grief symptoms affect the family characteristics. While the hypotheses purposed explained some of these relationships, additional analyses were conducted to understand the relationships in more depth and detail.

Expounding on the use of the first causal model, three additional CLPCs were conducted on the total scores of the three predictor measures, FAM-III Dyadic, FAM-III General and the FES. The cross-lagged correlation between Time 1 total FAM-III Dyadic score and Time 2 grief symptoms (see Figure 10) was not significantly different than the cross-lagged correlation between Time 1 grief and Time 2 total FAM-III Dyadic. This result suggest that FAM-III Dyadic scores were not significant predictors of grief at Time 2. The cross-lagged correlation between Time 1 total FAM-III General score and Time 2 grief symptoms (see Figure 11) was significantly different than the cross-lagged correlation between Time 1 grief and Time 2 total FAM-III General score (Z = -1.71, p < .01) suggesting that higher total scores on the FAM-III General scale at Time 1 was a significant predictor of less grief symptoms at Time 2. In addition, the cross-lagged correlation between the Time 1 total FES score and Time 2 grief symptoms (see Figure
was significantly different than the cross-lagged correlation between Time 1 grief and Time 2 total FES score ($Z = -2.47, p < .01$) suggesting that higher total scores on the FES at Time 1 was a significant predictor of less grief symptoms at Time 2.

The second causal model was also used for exploratory analyses. Hierarchical multiple regression analysis was used to investigate Time 2 family characteristics as criterion variables. When Time 2 FAM-III General Affect was used as a criterion variable, Time 1 FAM-III General Affect was the only variable that was a significant predictor ($Beta = .67, p < .001$). When Time 2 FES Affect was used as a criterion variable, Time 1 FES Affect was a significant predictor ($Beta = .64, p < .001$) and Time 1 FAM-III General Affect was also a significant predictor ($Beta = .41, p < .05$). When Time 2 Communication was used as a criterion variable, Time 1 FAM-III General Affect was the only significant predictor ($Beta = .45, p < .05$). Surprisingly, Time 1 Communication was not a significant predictor of Time 2 Communication. Finally, when Time 2 Cohesion was used as a criterion variable, Time 1 Cohesion was a significant predictor ($Beta = .51, p < .001$) and Time 1 FES Affect was marginally significant ($Beta = .29, p < .06$). Time 1 grief was not a significant predictor of any Time 2 family characteristic.
CHAPTER IV

DISCUSSION

Dealing with the death of a loved one is a very difficult task, one that every person who ever attaches to another will have to deal with at some point. This current study is unique in that it answers a call in the literature for quantitative longitudinal studies to understand grieving family systems (Hansson et al., 1993; Rando, 1993; Walsh & McGoldrick, 1991; Zisook, 1987). This study attempted to understand the cause and effect relationship between characteristics of the family system and grief symptoms after the death of a family member. Here, the family system characteristics of affect, communication, and cohesion were analyzed as both predictor and criterion variables in their relationship with grief symptoms. Results that could affect clinicians in their work with grieving families were found.

Intercorrelations

Correlations between sociodemographic and predictor or criterion variables found very few confounding variables. None of the sociodemographic variables were consistently correlated with Time 2 grief, suggesting that the variance in Time 2 grief was truly accounted for by predictor variables. Income's changing relationship with grief over time may be explained by a person's ability to use financial resources to help decrease stressful feelings at the beginning of the grief process, but becomes less of a factor at the grief process continues. There were strong intercorrelations among the Time 1 and Time
2 family characteristics, making it even more difficult to find true effects after controlling for other variables. These results are counter to previous research (Benoliel, 1985; Parkes, 1972) which has found that sex, age and socioeconomic status are concurrent factors that influence a person's adjustment and adaptation to loss.

**Hypothesis Analyses**

The first hypothesis was analyzed using three CLPCs. Affect was a significant predictor of grief at Time 2 suggesting that a family's ability to affectively express and share with each other is very important. These results were similar to other studies which found that the emotional interaction within a family is such an important indicator of overall functioning among the family members (Vess et al., 1985; Walsh & McGoldrick, 1991). Finally, Shapiro (1994) theorized that grief is a test of a family's ability to manage intense emotions. It is interesting to note that experiencing emotions is the only variable that is an important variable in both the theories of the grief process and the field of family systems. It is perhaps this overlap that makes affective experience and expression so important in predicting later grief symptoms.

In Hypothesis two, general family communication was found to be a significant predictor of grief at Time 2. Many researchers (Bowen, 1978; Bowlby-West, 1982; Jacobs, 1988; Steinglass, 1984) identify communication as a major predictor of family growth and development and a strong variable in the outcome of grief. Communication within a family is an important aspect of sharing one's grief feelings and helping the natural grief process. Past research (Wortman & Silver, 1989) concurs, finding that distress is necessary in the grief process and failing to experience distress is more
pathological. With expression of one's grief and sadness about the loss, the more a
person will naturally proceed through the grief process. Not experiencing and openly
expressing and processing grief symptoms could be seen as denial or repression
(Wortman & Silver, 1989). Some researchers (Reid et al., 1997) even caution clinicians
and families against the overprotection of the bereaved, which keeps them from the
normal, yet very painful, grief process.

The antithesis of open communication within a family could be seen as social
withdrawal, isolation or a lack of trust among the family members, leading to repressed
grief feelings. Related to openness, Glaser and Strauss (1965) developed the construct of
awareness contexts, which classified the style and content of communication family
members had with a dying family member. Applied to family communication after the
death of a family member, communication can be identified as one of the following types.
Closed awareness does not allow for communication about the death at all. Suspected
awareness involves some secrecy among family members, but the death is still noticeably
disrupting normal family interactions, and there is unspoken fear and anxiety. Mutual
pretense involves family members skirting around direct communication about the death
or the deceased, but it is not hidden. In mutual pretense, discussing the death or the
deceased is threatening and painful, and therefore avoided. Glaser and Strauss’ (1965)
mutual pretense classification lends support the current study's findings regarding
communication. In Glaser and Strauss' (1965) mutual pretense, family members find the
death too difficult and too painful to talk about and it hurts less to mutually agree to avoid
the topic. However, in a safe, cohesive family, family members would be more apt to
open up, communicate and share their grief feelings, with other family members. Therefore, the more communication, the more experience of the painful yet necessary feelings of grief. So, viewing Glaser and Strauss' (1965) mutual pretense via the current study, it is much easier and much less painful not to communicate about the death, therefore, there would be more repressed and less expressed grief feelings. The current study also supports this relationship between communication and cohesion. As seen in Table 2, communication and cohesion at Time 1 are strongly correlated, suggesting that families with more cohesion are a safer place in which to share ones grief feelings, therefore leading to more experienced symptoms. Finally, the open awareness classification is acknowledgment and discussion regarding the death and the deceased. Glaser and Strauss' (1965) awareness context is a crucial element in determining the interaction among family members and subsequent availability of support.

In Hypothesis three, the FES cohesion variable was a significant predictor of later grief symptoms. These results suggests that more perceived family cohesion at Time 1 leads to less grief symptoms at Time 2. Cohesion can best be described as the closeness or attachment family members have for one another. Working on the idea that family is a good source of social support, having a strong family connection in which you can trust and rely on others members helps remediate the pain of grief. In addition, family members that already more attached and have a more cohesive bond likely have more certainty and confidence that other family members will be there to support them and empathize with them in the loss of family member. Attachment literature consistently presents the attachments within the family system as secure base and stable and consistent
source of support for people (Byng-Hall & Campbell, 1981). Family attachments are relied upon after the death of a loved one and evidence of this reliability is found here in the current study. Attachment theory emphasizes the advantages of bonding to others and the fundamental drive of humans to make and maintain attachments (Jacobs et al., 1987). With the replacement of attachment to lost objects theorized as inevitable, available family members provide a source of redefined attachments for the survivors.

Hypothesis four was tested via a series of hierarchical multiple regressions to understand the interaction between affect and grief symptoms. Similar to the results found in Hypothesis one with cross-lagged panel analyses of affect, the variable of affect was not found to be a predictor of grief at Time 2. One explanation for the lack of detected effects could be the instruments used to measure affect. These instruments may have a weakness in their construct validity, that is, there may be a discrepancy between what this study is purporting to measure and what the instrument is truly measuring. In this respect, Roosa and Beais (1990) asserted that the FES may not be a sound instrument in content or construct validity. Other possible reasons for a lack of a detected difference could include some of the limitations of the study discussed below (i.e., small sample, short longitudinal time frame) as well as variable factors, including weak synchronous correlations and auto correlations of family variables as well as the increased stringency of the hierarchical multiple regression process.

There are also some theoretical explanations for affect being a poor predictor of grief at Time 2. First, some authors (Dubin & Sarnoff, 1986; Jacobs et al., 1987) purport a numbness or emotional blunting as a grief reaction, which would make it difficult for
survivors to express themselves to others in the family. More depressive symptoms of loss often are so overwhelming that it becomes too painful to share them. At times, these feelings are seen as negative or unacceptable, including the natural reaction (Reid, Balis & Sutton, 1997) of anger at the lost object, which could lead to repression of these feelings. Emotional expression may be confounded or impaired by the overwhelming feelings of loss and sadness after the death of a loved one. Bowen (1978) described these overwhelming feelings as an emotional shockwave that often drew family members to deny their emotional connections to the loss. If family members do, in fact, withdraw, isolate and deny emotional reactions as Bowen suggested, then the inability for affective experience to account for variance in grief at Time 2 is not surprising.

Hypothesis five used a series of hierarchical multiple regressions to investigate the interaction between communication and grief symptoms. Results found a switch in the direction of the effects of communication on grief between Time 1 and Time2. Time 1 communication was a predictor of more grief at Time 2, while Time 2 communication was a predictor of less grief at Time 2. One explanation of this change in direction could be a statistical artifact. The Time 1-Time 2 autocorrelation of communication is so strong that it can have a suppressor effect on grief at Time 2, given that communication and grief's zero-order correlations are all positive. The suppressor effect would influence the results of a hierarchical multiple regression analysis more than the results of the previous CLPC in Hypothesis two, which did consistently and significantly predict later grief symptoms.
An additional explanation for the lack of an influence of communication is that communication may not a significant factor in a person's grief recovery. The variety of personality and communication styles that influence a person's comfort level with communicating feelings could affect whether or not communication is important. For some people who are more reserved in their emotional processing may find communicating about grief as less helpful and more painful.

Hypothesis six used a series of hierarchical multiple regressions to investigate the interaction between cohesion and grief symptoms. While Time 2 cohesion, like all of the other Time 2 family characteristics, was not a significant predictor of grief at Time 2, cohesion at Time 1 was a significant predictor of grief at Time 2. These results, like the CLPC results, suggest that more cohesive families act as the best forms of emotional support, even after the death of a family member. The creators of the Family Environment Scale describe cohesion as, “the degree of commitment, help, and support family members provide for one another,” (Moos & Moos, 1994, pg. 1), which would be congruent with what the participants need the most during bereavement. Much of the current literature identified cohesion within a family as an important mediator of grief symptoms. Beavers’ (1981) circumplex model of flexibility and expressiveness of families relies heavily on the construct of cohesion as a major variable on which to measure families. Beavers’ idea of cohesion, or togetherness, can be described as the emotional bonding that family members feel toward each other (Walsh, 1993). Cohesion can also be seen as the attachment among family members that assures people that other family members are willing to help and listen (Range et al., 1992). Beavers’ (1981)
model emphasized a balanced, healthy level of cohesion or boundaries, being neither too enmeshed or too disengaged. Healthy cohesion can be seen as the opposite of isolation and disengagement, which can occur after the death of a family member (Crosby & Jose, 1983; Shapiro, 1994).

Hypothesis seven used hierarchical multiple regression to estimate the amount of variance Time 1 grief accounted for in the Time 2 grief. While the predictive relationship was strong, there were still other variables that were able to account for more of the variance. Overall, it is important to note that even when controlling for sociodemographic variables, Time 1 grief and Time 2 family system characteristics, cohesion and communication still accounted for significant amounts of variance in grief at Time 2. Changes in average levels of grief (see Table 1) would be consistent with participants experiencing more intensity at Time 1 and less intensity at Time 2.

Exploratory Analyses

Sociodemographic variables had no significant predictive value of grief symptoms at Time 2, when taking Time 1 and Time 2 family characteristics into consideration. When the three additional CLPCs that used total scores of the FES, FAM III dyadic and FAM III general were calculated, the total scores on the FES and the FAM-III General scale were significant predictors of grief at Time 2. These results suggest that the FES and the FAM-III General scale are psychometrically sound, reliable and valid measures of family interaction. In addition, these results suggest that knowing a family’s premorbid overall functioning will help predict how they will do with the grief process in the long run.
Finally, when family characteristics at Time 2 are used as the criterion variable, there are no significant effects of grief symptoms at Time 1 or Time 2. These results do not provide support for the theoretical and clinical idea that the grief process affects the characteristics of the family system. This lack of support, however, could be explained by the short longitudinal time span, the small sample size and some of the other following limitations of this current study.

Previous studies provide a great deal of information about a family's adjustment to a loss. When adjusting to loss, participants in the current study seemed to be better able to move through the grief process easier when they communicated more with other family members and perceived the family as a cohesive group. Better adjustment to loss has been predicted by a person's ability to incorporate, react, redefine, readjust and reinterpret the loss and surviving family relationships (Braun & Berg, 1994; Rando, 1993; Wortman et al., 1993). These grief tasks can be facilitated by a family system that is perceived to be supportive, stable and consistent. The degree to which a relationship is replaceable (Benoliel, 1985) also aids in future adjustment to a loss and physically and emotionally available family members are seen as the most therapeutic option to replace lost relationships.

Current Limitations

As with all studies, the current project reflects some limitations and constraints on the generalizability and applicability of its findings. In this current study, two very important variables about the deceased person were not sampled and controlled for. First, this study did not consider the nature of the death of the deceased person, who was either
a parent or spouse of the participant. The nature of how a person dies is an important variable. Many studies have found significant differences in the grief process dependent upon how the deceased died (Allen et al., 1993), including the most complicated and/or stigmatized deaths by homicide (Range, Walston & Pollard, 1992), suicide (VanDongen, 1993), and AIDS (Huber, 1993). Second, this current study did not obtain the age of the deceased. However, by using the ages of the participants (21-75 years of age) and the fact that participants lost either a spouse or a parent, one could deduce that the age range of the deceased was approximately 50-70 years old. Therefore, the results of this current study may not be generalizable or applicable to deceased that are significantly younger or significantly older. The two missing variables of nature of the death and exact age range of the deceased could have affected the results of this current study, however, the extent of the possible affects are not known.

The sample size of this current study is relatively small. Of the hundreds of potential Time 1 participants contacted and given the opportunity to help, only 66 were complete Time 1 participants. Of those 66, a surprising 61 completed both Time 1 and Time 2. While this decrease in participants represents surprisingly small attrition, more participants are needed in order for statistical analyses to contain more power and produce bigger effect sizes.

A very unique part of this current study’s design is the study’s longitudinal nature. However, the longitudinal time span is only six months long, which this researcher believes is too short to detect changes in family system characteristics. While the six months was long enough to detect some changes in grief symptoms, most clinical
research suggests that grief symptoms can last at least one year, especially after the death of a parent or a spouse. The author is planning on attempting a third wave of data collection approximately one year after Time 2, and therefore one and a half years after Time 1. Out of the current 61 participants, even with 50 remaining participants after attrition measures of their grief symptoms and family characteristics would be clinically useful. The sample in this current study is relatively heterogenous on the variables other than those purposely controlled by design (e.g., relationship of the deceased, the surviving relationship referred to in the FAM-III Dyadic form). These results reflect the joint influence of male and female participants, as well as death of a parent versus death of spouse, which may or may not reflect bereavement related aspects of particular demographic groups.

One example of a sample limitation of this study is that 66% of participants were women. While this demographic difference is not a weakness, it does suggest that these results and subsequent implications are more likely relevant to women than to men. A more gender equal sample would allow for more generalizability. Past studies have found varying differences in the grief process of males and females. Sprang, McNeil and Wright (1992-92) found that while female participants experienced more symptoms overall, they also utilized more social supports than their male counterparts. In addition, social support, age and marital status were found to be bigger influences on a female participant’s grief process than males. For male participants, past experience with death, the extent of mourning and expression of grief were the strongest predictors of subsequent grief symptoms (Sprang et al., 1992-93). In a study of older widowers, Byrne
and Raphael (1994) found that participants had less guilt, anger and physical symptoms than other studies involving women and younger widowers.

A final sample limitation of this study was the criteria of the relationship of the deceased to the participant. While this criteria does not reduce the value of the findings, it does mean that the results of the current study cannot be generalized to people who have experienced the death of anyone other than a parent or spouse. Certainly experiencing the death of a child is the most traumatic and disturbing to a person’s family and social organization. The current study only sampled participants who experienced the death of a parent or a spouse, with more of an emphasis on the participants experience of the surviving relationships, and with little focus on the participant’s qualitative relationship to the deceased. Both the death of a spouse and the death of a parent require a person to replace the lost attachment and redefine the family system, whether it is the family of origin or a created family (Gray, 1987; Moody & Moody, 1991; Shuchter & Zisook, 1987). The majority of the people in the current study experienced the death of a parent, which suggests that the results and implications are more likely relevant to people who have similar losses.

A design limitation of this study was that this project assessed the individual’s perception of the family, which is very subjective and may be skewed. This limitation reflects one of the biggest difficulties facing the studies of families. Unless each family member is questioned about family functioning, and all of the views are consistent, then we will never get the exact, true report of the level of functioning of a family. This
current study only purports to show the affects of losing a parent or a spouse on the surviving general family interaction and parent-child or spousal dyadic relationship.

An additional possible theoretical and design limitation of this study, like the limitation prior, may lie in the definition of “family,” and is problematic in many family studies. The definition of who and what constitutes a family is a large obstacle to family research. The biological and marital relationships of family members are all factors in defining who is family (i.e., family of origin vs. Created family; participant as adult child in a family or adult parent in a family). Benoliel (1985) asserted that the grief tasks were different when the surviving family members considered were a participants’ parents versus a participants’ own children. While a person’s family perception is subjective and skewed, it may not be a limitation in this study. When thinking about the clinical importance of these results, it is noted that grief is an individual process and quite subjective. This is especially relevant in that what is being predicted in this study is a participant’s own individual grief and not a true family process.

A final design limitations comes with utilizing the term or construct of causality. Theoretically, other studies have found support for asserting that grief symptoms predict changes in family characteristics (Vess et al., 1985) as well as family characteristics predicting the outcome of the grief process (Sprang et al., 1992-93). The true experimental method, however, includes measurement of premorbid functioning, then random, double blind assignment to affected and unaffected groups, and then exact postmorbid functioning measured (Campbell & Stanley, 1963). Unless this true experimental method is used, true causality cannot be asserted (Cook & Campbell, 1979).
Obviously, in humane and ethical research, it is impossible to measure premorbid functioning, and then randomly assign people to “experienced recent grief,” and “has not experienced recent grief,” groups. However, given these constraints, even with careful application of theory strong models, such as the CLPC and hierarchical multiple regression, there is still room for questioning the assumption of causality.

**Implications of the Current Study**

The results of this current study could be helpful in the fields of grief and bereavement and family treatment. When working with individuals who have recently experienced the death of a loved one, it would be important to educate them on the different emotional and social aspects of the normal grief process. Individual therapy usually involves developing an attachment to the therapist, representing created replacement cohesion (Lamberti & Detmer, 1993; Parkes & Weiss, 1983). Clinicians should help clients become aware of how communication with family members can be helpful in processing grief symptoms. Clients should also be encouraged to rely on family members as a source of help and emotional support during bereavement. Family can mediate stress reactions in its members (Bloch, 1991; Kaplan et al., 1973).

Families are a unique system of attached individuals whose most helpful, and possibly most harmful, defining characteristics are that they behave in patterned, consistent and predictable that members come to rely upon (Steinglass, 1984). It is this predictability that leads members to believe that they can rely on one another for support. The results of communication predicting more experienced grief symptoms and a cohesive family system predicting less experienced grief symptoms are very useful results.
for clinicians working with family systems that have recently experienced the death of a family member. When working with families, it is important for clinicians to focus on the unique ways each particular family is attached. Every family has its own strengths, definitions of relationships, and ways members trust and support each other. An additional important characteristic of the family system is its homeostatic nature and the way systems naturally move toward balance and consistency (Bloch, 1991; Jackson, 1968; Steinglass, 1984), even in the wake of extraordinary life events. Stressful life events can often lead a family to more opportunities for positive life changes in the long run (Lehman et al., 1987). It is the natural drive toward homeostasis, or re-establishing the balance in a family system, that a clinician can use to help grieving families.

When dealing with families that have recently experienced the death of a family member, family therapy is often based on either Minuchin’s structural theory or Bowen’s emotional processing theory. Structural theory focuses on communication about role replacement and redefining, identifying new relationships and reorganization of the family structure. Bowenian theory utilizes emotional processing (e.g., creating a scrapbook, sharing memories, etc.) and identifying emotional fusions and cut-offs (Lamberti & Detmer, 1993; Parkes & Weiss, 1983). Both of these treatment approaches hinge on a family’s ability to communicate and their level of cohesion. These family characteristics can help a family system process through the common grief reactions such as shock, wanting to maintain symbolic representation of the deceased and the depressive symptoms of despair until the family system can reorganize and establish new object relations (Averill & Nunley, 1988).
Finally, unlike Kissane and Bloch (1994) and Bolby-West (1982) there was no evidence in the current study to suggest that communication, cohesion and affect decreased over the six month span of time. These results suggest, like other researchers (Bowen, 1981; Walsh, 1993) that family characteristics are stable and consistent over time, in after a traumatic life event. These results also reiterate the strength of the family system's draw toward homeostasis in terms of affect, communication and cohesion. It would be very important for clinicians to help both individuals and families to understand that sharing ones grief with family members, and relying upon them during bereavement, does not significantly negatively affect the surviving family relationships. Clinicians could encourage family members that helping other family member in their grief can be an additional source of support for themselves.
APPENDIX A

PARTICIPANT INTRODUCTION LETTER
Dear Participant:

At one time or another we all must deal with the loss of a loved one. While there is some information on how death of someone close effects people individually, little is known about how the death effects the family and the relationships within the family.

We are conducting a study on how the grieving process can effect the relationships within the family, and how the characteristics of the family can effect the grieving process. It is our hope that with your help on this current project, we can identify ways in which counselors and people in other helping professions can best meet the needs of grieving people and their families.

You are being asked to participate in this project as a person who has recently experienced the death of a family member. Participation in the study involves taking approximately 45 minutes to complete a questionnaire. There is no cost or fee to you for your participation, and you can withdraw at any time. Approximately 75 people who have also experienced the death of a family member will participate in this study.

If you choose to participate in the study, your answers will be kept strictly confidential. Only the two people signed at the bottom of this letter will have access to your name or the names of other family members. The potential personal benefits from participation are the opportunity to relate your own feelings as an individual who is experiencing the loss of a loved one and in so doing, to help professionals provide more compassionate care to other families and people in the future.

We hope you choose to participate. Thank you for taking the time to consider this research as worthwhile and beneficial to others who will face the grief of losing someone close to them. We know how valuable your time is, and that is why your participation is all the more appreciated. If you have any questions, please call Elaine Schoka at 940-565-2671.

Sincerely,

Elaine Schoka, M.S.  Bert Hayslip, Jr., Ph.D.
Doctoral Candidate  Professor of Psychology
Clinical Psychology  Department of Psychology
APPENDIX B

INFORMED CONSENT
INFORMED CONSENT

The purpose of this study is to investigate your feelings about your family and the relationships within your family as well as your current experiences of grief and loss. Your participation will involve completing a written questionnaire about your feelings and experiences. The completion of the questionnaire should take approximately 45 minutes to 1 hour. The study is for research purposes, no cost or fee is involved in participation, and you may withdraw from the study at any time without any further obligation.

All information is completely confidential, and neither your name nor information associated with your situation will be used outside of this current study. The primary benefits of participation are to help professionals and caregivers in the area of bereavement provide more compassionate and helpful care to people and their families who are suffering the death of a loved one. You will be provided a summary of the results of this research if you so choose.

Having fully understood the above information, and with the knowledge I may contact Elaine Schoka or Dr. Bert Hayslip at the University of North Texas Department of Psychology at 940-565-2671 if I have any additional questions or concerns at any time, I voluntarily consent to participate in this study.

Name (print): ___________________________ Date ________

Signature: ______________________________

Researcher: ____________________________ Date ________
Background Questionnaire

The first thing I would like to do is get some background information about you and your family. Please remember that the information you provide here and on other forms is kept confidential and will be kept in a safe place. If you have any difficulty with any of the questions, please do not hesitate to let me know.

Name __________________________ Birthdate ______ / ______ / 19____ Age ______ years

Please answer the following questions by placing a check mark next to your selection:

1. Gender
   ____ 1) Male  ____ 2) Female

2. Race or Ethnic identification:

3. Religious Affiliation:
   ____ 1) Catholic  ____ 2) Protestant  ____ 3) Christian  ____ 4) Jewish  ____ 5) None  ____ 6) Other

4. Relationship Status:
   ____ 1) Single/Never Married  ____ 2) Married  ____ 3) In a committed relationship  ____ 4) Divorced/Separated  ____ 5) Widowed

5. Occupation/Job Title: __________________________________________

6. How many years of experience do you have in this line of work? ______ years

7. Education:
   ____ 1) H.S. Diploma/GED  ____ 2) 1-2 years college or technical training  ____ 3) 3-4 years college  ____ 4) college graduate  ____ 5) graduate or professional degree

8. Total Gross Household Income (per year):
   ____ 1) < $15,000  ____ 2) $15,001 - $25,000  ____ 3) $25,001 - $35,000  ____ 4) $35,001 - $50,000  ____ 5) $50,001 - $75,000  ____ 6) > $75,000
9. Please tell me who you live with right now and how they are related to you:

<table>
<thead>
<tr>
<th>Name</th>
<th>Relationship</th>
<th>Name</th>
<th>Relationship</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

I would now like to ask you some questions about your family member who died.

10. What was the name of the person who died:

11. How was he or she related to you. (please check one) The person who died was my:

- 1) Father
- 2) Mother
- 3) Son
- 4) Daughter
- 5) Brother
- 6) Sister
- 7) Wife
- 8) Husband
- 9) Grandmother
- 10) Grandfather
- 11) Grandson
- 12) Granddaughter
- 13) Cousin
- 14) Sister-in-law
- 15) Brother-in-law

12. Before this person died, had you previously experienced the death of someone else close to you?

Please let me know the name, relationship to you and when they died.

<table>
<thead>
<tr>
<th>Name</th>
<th>Relationship</th>
<th>Date they died</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

13. I would really like to be able to contact you again in approximately six months to check in with you and see how you are doing. Would that be okay with you? _______ Yes _______ No

What would be the best address to contact you at:

<table>
<thead>
<tr>
<th>Name</th>
<th>Address</th>
<th>Phone #</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Six months is a long time, and sometimes people move or change their address. Could you please leave an address of someone, like a friend or family member, who would likely always know where you are, if I have a hard time contacting you:

<table>
<thead>
<tr>
<th>Name</th>
<th>Address</th>
<th>Phone #</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Variable</td>
<td>Time 1</td>
<td>Time 2</td>
</tr>
<tr>
<td>--------------------------</td>
<td>-----------------</td>
<td>-----------------</td>
</tr>
<tr>
<td></td>
<td>Mean</td>
<td>Standard Deviation</td>
</tr>
<tr>
<td>Age</td>
<td>46.85</td>
<td>11.75</td>
</tr>
<tr>
<td>FAM-III Dyadic Affect</td>
<td>18.74</td>
<td>3.20</td>
</tr>
<tr>
<td>FES Affect</td>
<td>5.92</td>
<td>2.11</td>
</tr>
<tr>
<td>FAM-III Dyadic Communication</td>
<td>19.38</td>
<td>3.16</td>
</tr>
<tr>
<td>FAM-III General Communication</td>
<td>15.26</td>
<td>2.93</td>
</tr>
<tr>
<td>FES Cohesion</td>
<td>6.89</td>
<td>2.60</td>
</tr>
<tr>
<td>FAM-III Dyadic Total</td>
<td>134.76</td>
<td>18.97</td>
</tr>
<tr>
<td>FAM-III General Total</td>
<td>141.39</td>
<td>22.63</td>
</tr>
<tr>
<td>FES Total</td>
<td>60.61</td>
<td>14.69</td>
</tr>
<tr>
<td>GEI Total</td>
<td>34.29</td>
<td>17.69</td>
</tr>
</tbody>
</table>
Table 2
Intercorrelations Among Sociodemographic, Predictor Variables and Time 2 Outcome Measures (N = 61)

<table>
<thead>
<tr>
<th>Variable</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
<th>10</th>
<th>11</th>
<th>12</th>
<th>13</th>
<th>14</th>
<th>15</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Gender(^a)</td>
<td>-.15</td>
<td>-.20</td>
<td>.05</td>
<td>-.22</td>
<td>.01</td>
<td>.05</td>
<td>-.13</td>
<td>.09</td>
<td>.33*</td>
<td>.21</td>
<td>.19</td>
<td>-.00</td>
<td>.28*</td>
<td>.25</td>
</tr>
<tr>
<td>2. Income</td>
<td>.41*</td>
<td>.15</td>
<td>.49*</td>
<td>.10</td>
<td>.03</td>
<td>.12</td>
<td>.11</td>
<td>-.41*</td>
<td>.16</td>
<td>.10</td>
<td>.13</td>
<td>.17</td>
<td>-.14</td>
<td></td>
</tr>
<tr>
<td>3. Education</td>
<td>-.16</td>
<td>.12</td>
<td>.16</td>
<td>.07</td>
<td>.27*</td>
<td>.17</td>
<td>-.11</td>
<td>.04</td>
<td>.02</td>
<td>.06</td>
<td>.06</td>
<td>-.24</td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. Age</td>
<td>-.08</td>
<td>.02</td>
<td>-.04</td>
<td>-.05</td>
<td>.00</td>
<td>-.28*</td>
<td>-.11</td>
<td>-.07</td>
<td>-.11</td>
<td>-.21</td>
<td>-.11</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. Marital Status(^b)</td>
<td>.13</td>
<td>-.04</td>
<td>.15</td>
<td>.12</td>
<td>-.23*</td>
<td>.11</td>
<td>.06</td>
<td>.15</td>
<td>.22</td>
<td>-.23</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. FAM III Affect, Time 1</td>
<td>.63*</td>
<td>.86*</td>
<td>.72*</td>
<td>-.21*</td>
<td>.70*</td>
<td>.52*</td>
<td>.67*</td>
<td>.62*</td>
<td>-.34*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. FES Affect, Time 1</td>
<td>.63*</td>
<td>.75*</td>
<td>-.03</td>
<td>.59*</td>
<td>.66*</td>
<td>.57*</td>
<td>.60*</td>
<td>-.16</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. Communication, Time 1</td>
<td>.70*</td>
<td>-.22*</td>
<td>.55*</td>
<td>.43</td>
<td>.60</td>
<td>.53</td>
<td>-.29</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>9. Cohesion, Time 1</td>
<td>-.13</td>
<td>.64*</td>
<td>.54*</td>
<td>.60*</td>
<td>.73*</td>
<td>-.35*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10. Grief, Time 1</td>
<td>-.09</td>
<td>.07</td>
<td>-.08</td>
<td>.02</td>
<td>.58*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>11. FAM III Affect, Time 2</td>
<td>.72*</td>
<td>.79*</td>
<td>.73*</td>
<td>.24*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>12. FES Affect, Time 2</td>
<td>.62</td>
<td>.70*</td>
<td>-.02</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13. Communication, Time 2</td>
<td>.62*</td>
<td>-.27*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>14. Cohesion, Time 2</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>15. Grief, Time 2</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>.14</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* indicates correlation is significant at the \( p < .05 \) level
\(^+\) indicates correlation is significant at the \( p < .01 \) level

a. Gender is coded 1 = female, 2 = male
b. Marital Status is coded 1 = not currently in a significant relationship, 2 = currently in a significant relationship
Table 3
Summary of Multiple Regression Analysis for Demographic Variables, Affect at Time 1 and Affect at Time 2 predicting Grief at Time 2 (N = 61): Hypothesis 4

<table>
<thead>
<tr>
<th>Predictor</th>
<th>Unstandardized</th>
<th>Beta</th>
<th>T Value</th>
<th>Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Income</td>
<td>2.02</td>
<td>.18</td>
<td>1.15</td>
<td>.25</td>
</tr>
<tr>
<td>Age</td>
<td>-.06</td>
<td>-.04</td>
<td>-.34</td>
<td>.73</td>
</tr>
<tr>
<td>Gender</td>
<td>.49</td>
<td>.01</td>
<td>.09</td>
<td>.92</td>
</tr>
<tr>
<td>Education</td>
<td>-2.72</td>
<td>-.24</td>
<td>-1.75</td>
<td>.08</td>
</tr>
<tr>
<td>Marital Status</td>
<td>-5.80</td>
<td>-.18</td>
<td>-1.36</td>
<td>.17</td>
</tr>
<tr>
<td>FAM III Affect, Time 1</td>
<td>-.55</td>
<td>-.10</td>
<td>-.42</td>
<td>.67</td>
</tr>
<tr>
<td>FES Affective</td>
<td>.88</td>
<td>.11</td>
<td>.56</td>
<td>.57</td>
</tr>
<tr>
<td>Expression, Time 1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Grief, Time 1</td>
<td>.49</td>
<td>.52</td>
<td>3.77</td>
<td>.00</td>
</tr>
<tr>
<td>FAM III Affect, Time 2</td>
<td>-.42</td>
<td>-.07</td>
<td>-.29</td>
<td>.76</td>
</tr>
<tr>
<td>FES Affective</td>
<td>.46</td>
<td>.06</td>
<td>.31</td>
<td>.75</td>
</tr>
<tr>
<td>Expression, Time 2</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note. Overall fit: $F = 3.47 (14,43), p < .01, \text{Multiple } R = .72, R^2 = .53, \text{Adjusted } R^2 = .37$
Table 4
Summary of Multiple Regression Analysis for Demographic Variables, Communication at Time 1 and Communication at Time 2 predicting Grief at Time 2 (N = 61): Hypothesis 5

Dependent Variable: Grief at Time 2

<table>
<thead>
<tr>
<th>Predictor</th>
<th>Unstandardized Beta</th>
<th>Beta</th>
<th>T Value</th>
<th>Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Income</td>
<td>2.02</td>
<td>.18</td>
<td>1.15</td>
<td>.25</td>
</tr>
<tr>
<td>Age</td>
<td>-.06</td>
<td>-.04</td>
<td>-.34</td>
<td>.73</td>
</tr>
<tr>
<td>Gender</td>
<td>.49</td>
<td>.01</td>
<td>.09</td>
<td>.92</td>
</tr>
<tr>
<td>Education</td>
<td>-2.72</td>
<td>-.24</td>
<td>-1.75</td>
<td>.08</td>
</tr>
<tr>
<td>Marital Status</td>
<td>-5.80</td>
<td>-.18</td>
<td>-1.36</td>
<td>.17</td>
</tr>
<tr>
<td>FAM III</td>
<td>1.67</td>
<td>.30</td>
<td>1.24</td>
<td>.21</td>
</tr>
<tr>
<td>Communication, Time 1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Grief, Time 1</td>
<td>.49</td>
<td>.52</td>
<td>3.77</td>
<td>.00</td>
</tr>
<tr>
<td>FAM III</td>
<td>-1.02</td>
<td>-.15</td>
<td>-.80</td>
<td>.42</td>
</tr>
<tr>
<td>Communication, Time 2</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note. Overall fit: $F = 3.47$ (14,43), $p < .01$, Multiple $R = .72$, $R^2 = .53$, Adjusted $R^2 = .37$
Table 5
Summary of Multiple Regression Analysis for Demographic Variables, Cohesion at Time 1 and Cohesion at Time 2 predicting Grief at Time 2 (N = 61): Hypothesis 6

<table>
<thead>
<tr>
<th>Predictor</th>
<th>Unstandardized Beta</th>
<th>Beta</th>
<th>T Value</th>
<th>Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Income</td>
<td>2.02</td>
<td>.18</td>
<td>1.15</td>
<td>.25</td>
</tr>
<tr>
<td>Age</td>
<td>-.06</td>
<td>-.04</td>
<td>-.34</td>
<td>.73</td>
</tr>
<tr>
<td>Gender</td>
<td>.49</td>
<td>.01</td>
<td>.09</td>
<td>.92</td>
</tr>
<tr>
<td>Education</td>
<td>-2.72</td>
<td>-.24</td>
<td>-1.75</td>
<td>.08</td>
</tr>
<tr>
<td>Marital Status</td>
<td>-5.80</td>
<td>-.18</td>
<td>-1.36</td>
<td>.17</td>
</tr>
<tr>
<td>FES Cohesion, Time 1</td>
<td>-2.91</td>
<td>-.46</td>
<td>-1.96</td>
<td>.05</td>
</tr>
<tr>
<td>Grief, Time 1</td>
<td>.49</td>
<td>.52</td>
<td>3.77</td>
<td>.00</td>
</tr>
<tr>
<td>FES Cohesion, Time 2</td>
<td>1.01</td>
<td>.13</td>
<td>.55</td>
<td>.57</td>
</tr>
</tbody>
</table>

Note. Overall fit: F = 3.47 (14, 43), p < .01, Multiple R = .72, R² = .53, Adjusted R² = .37
APPENDIX E

FIGURES
Figure 1
Cross-Lagged Panel Correlation Model to Explain the Relationship Between Family Characteristics and Grief Symptoms
Figure 2
Longitudinal Hierarchical Multiple Regression Model to Explain the Relationship Between Family Characteristics and Grief Symptoms

Exogenous Variables
Sociodemographic Variables
Time 1

Endogenous Variables
Intermediate Variables

Criterion Variable

Gender

FAM III
Affect at
Time 1

FES
Affect at
Time 1

Grief
at
Time 1

Communication
at Time 1

Cohesion
at Time 1

FAM III
Affect at
Time 2

FES
Affect at
Time 2

Communication
at Time 2

Cohesion
at Time 2

Grief
at
Time 2
Figure 3: Cross-Lagged Panel Correlation, Hypothesis #1: FAM-III Dyadic Affect

FAM-III Dyadic Affect

Time 1

X_{1} (1)

Synchronous r = - . .12

Y_{2} (4)
Grief Symptoms
Time 2

Auto r = .58

Z = .26, NS

Cross-Lagged Y_{2}X_{1}, r = .19

Auto r = .67

X_{2} (3)

Synchronous r = - . .12

Grief Symptoms
Time 1

Cross-Lagged Y_{1}X_{1}, r = .19

Y_{1} (2)
Grief Symptoms
Time 1

0.1
Figure 4
Cross-Lagged Panel Correlation Hypothesis #1: FAM-III General Affect

Time 1
FAM III General Affect

Time 2
Synchronous r = -.24

Auto r = .70

Cross-Lagged Y2X1, r = .34

Cross-Lagged Y1X2, r = .69

Y1
Auto r = .58

Grief Symptoms
Time 1
Z = -1.75, p < .01

Y2
Synchronous r = -.21
Figure 5
Cross-Lagged Panel Correlation, Hypothesis #1: FES Affective Expression

Time 1

FES Affective Expression

(1) $X_1$

Auto $r = .66$

Cross-Lagged $Y_2X_1 \ r = -.16$

Cross-Lagged $Y_1X_2 \ r = .07$

Synchronous $r = -.03$

Time 2

FES Affective Expression

$X_2$ (3)

Synchronous $r = -.02$

(2) $Y_1$

Grief Symptoms

Time 1

$Z = 1.00$, NS

(4) $Y_2$

Grief Symptoms

Time 2

Auto $r = .58$

$Y_2$ (4)
Figure 6: Cross-Lagged Panel Correlation, Hypothesis #2: FAM III Dyadic Communication

- Time 1
  - FAM III Communication
  - Auto r = .73
  - X₈ (1)
  - Cross-Lagged Y₂X₁ r = -.13

- Time 2
  - Y₂ (4)
  - Grief Symptoms
  - Aut r = .58
  - Z₁ = .41, NS

Synchronous r = -.17
Figure 7
Cross – Lagged Panel Correlation, Hypothesis #2: FAM-III General Communication

Time 1

FAM III Communication

(1) X₁

Cross-Lagged Y₂X₁ r = -0.29

Synchronous r = -0.22

Cross-Lagged Y₁X₂ r = -0.08

(2) Y₁
Grief Symptoms
Time 1

Auto r = 0.58

Z = -1.45, p < 0.05

Time 2

FAM III Communication

X₂ (3)

Synchronous r = -0.27

Y₂ (4)
Grief Symptoms
Time 2
Figure 8
Cross-Lagged Panel Correlation, Hypothesis #3: FES Cohesion

X₁ (1)  |  X₂ (2)
--- | ---
FES Cohesion  |  FES Cohesion

Synchronous r = -.14

Auto r = .73

Cross-Lagged Y₂X₁, r = -.35

Cross-Lagged Y₁X₂, r = .02

(1)  (2)

Z = -2.32, p < .01

Grief Symptoms  |  Grief Symptoms

Time 1  |  Time 2

(3)  (4)
Figure 9
Longitudinal Hierarchical Regression Model to Explain the Relationship Between Family Characteristics and Grief Symptoms, Hypotheses 4-7

Exogenous Variables
Sociodemographic Variables
Time 1

Endogenous Variables
Intermediate Variables
Time 2

Criterion Variable
Time 2

Note. Only those standardized Betas that are significant at the p < .05 or less are recorded here. Those standardized Betas not recorded did not meet this level of significance.
Figure 10
Cross-Lagged Panel Correlation, Exploratory Analyses: Total FAM III Dyadic

- Time 1
  - Total FAM III Dyadic
  - Auto r = 0.76
  - Cross-Lagged Y1X1 r = -0.21
  - Synchronous r = -0.14

- Time 2
  - Grief Symptoms
  - Y2 (4)
  - Auto r = 0.58
  - Z = -0.99, NS

60° - = = 80°

Note: The diagram illustrates the relationships between Total FAM III Dyadic at Time 1 and Grief Symptoms at Time 2, with synchronous and cross-lagged correlations indicated.
Figure 11
Cross-Lagged Panel Correlation, Exploratory Analyses: Total FAM-III General

Time 1

Total FAM III General

(1) \( X_1 \)

Auto \( r = .69 \)

Cross-Lagged \( Y_2X_1 \) \( r = -.32 \)

Synchronous \( r = -.18 \)

Cross-Lagged \( Y_1X_2 \) \( r = -0.09 \)

(2) \( Y_1 \)

Grief Symptoms

Time 1

Z = -1.71, \( p < .01 \)

Time 2

Total FAM III General

(3) \( X_2 \)

Auto \( r = .58 \)

Synchronous \( r = -.28 \)

(4) \( Y_2 \)

Grief Symptoms

Time 2
Synchronous $r = -0.12$

$$X_2 (3)$$

Total FES

Time 2

Auto $r = 0.43$

Cross-Lagged $Y_X X_1, r = 0.32$

Cross-Lagged $Y_X X_1, r = -0.03$

Total FES

(1)

$X_1$

Synchronous $r = -0.03$

Auto $r = 0.58$

$Y_2 (4)$

Grief Symptoms

Time 2

$Z = -2.47, p < 0.01$

(2) $Y_1$

Grief Symptoms

Time 1
REFERENCES


