THE IMPACT OF THE DEATH OF A PEER ON ADOLESCENTS

by

Kerri Ann Weise

Thesis submitted to the Faculty of the

Virginia Polytechnic Institute and State University

in partial fulfillment of the requirements for the degree of

MASTER OF SCIENCE

in

Psychology

APPROVED:

Russell T. Jones, Ph.D., Chairman

Jack W. Finney, Ph. D.

George R. Clum, Ph.D.

September, 1992

Blacksburg, Virginia

THE IMPACT OF THE DEATH OF A PEER ON ADOLESCENTS

by

Kerri Ann Weise

Committee Chairman: Russell T. Jones
Psychology

(ABSTRACT)

Increasing rates of adolescent homicide, suicide, and AIDS have forced researchers to relinquish comforting beliefs about youth and vitality, and to accept the reality of adolescent death. Previous studies of bereavement have given precedence to parental and fraternal relations, and peers of deceased adolescents have gone largely unnoticed. What literature exists in the area of peer bereavement suggests that the process of mourning a peer closely parallels the process of mourning a sibling. The present study set forth to study empirically the cognitive, behavioral, and affective responses of adolescents to the death of a peer, and to determine possible mediators of bereavement reactions. Fifty undergraduates who had recently lost a peer (bereaved) and 52 controls (nonbereaved) were compared on a series of objective measures. Beliefs about the meaningfulness of the world, self-worth, and morality emerged as important variables in distinguishing between bereaved and nonbereaved samples. Further, satisfaction with an available social support network, and locus of control appeared as significant variables, accounting for differences in grief responses of the bereaved. Results are discussed within a developmental framework.

TABLE OF CONTENTS

THE IMPACT OF THE DEATH OF A PEER ON ADOLESCENTS

TABLES AND FIGURES

THE IMPACT OF THE DEATH OF A PEER ON ADOLESCENTS

ACKNOWLEDGEMENTS

I gratefully acknowledge the assistance of Dr. Russell Jones for his eternal optimism and for his numerous comments on a draft of this document. I would also like to acknowledge Dr. George Clum and Dr. Jack Finney for their practical help and ongoing encouragement. Finally, would like to thank Jonathan Augusto for his support, particularly during times of crises, Terri Weaver for being a great listener and for offering constructive criticism, and my parents, Jeffrey and Carol Weise, for teaching me to persevere.

Introduction

Adolescent reactions to death and dying is an area of psychological research that has received relatively little empirical investigation (Balk, 1991; McNeil, Silliman, & Swihart, 1991). Much of this sparsity can be attributed to our culture's avoidant attitudes toward death (Feifel, 1959). At one time death was an integral part of family life. Today, death is lonelier. The aged and infirm are put in institutions, and grandparents rarely live under the same roof with grandchildren (Hendin, 1984). The living have become isolated from the dying; consequently, death has taken on added mystery and fear.

Death of an adolescent complicates this fearful reaction by upsetting the natural order of life (Balk, 1991). No one expects young people to die. Adolescence is usually viewed as a time of healthy development and exploration of the self (LaTour, 1983). It can be an exhilarating time, with new responsibilities and new freedom. It can be a frightening time, when the burdens of these new responsibilities seem enormous and overwhelming. There may be inner conflicts as the individual strives to explore the world outside of the family -- while clinging to the security that the family has offered (LaTour, 1983). Adolescence is associated with identity formation and sexual exploration (Balk, 1991). It is not associated with death.

When an adolescent dies, shock, sadness, and anger at the "waste of life" are inevitably invoked in relatives, friends, and acquaintances (McNeil et al., 1991). Adolescent death has been strongly associated with seemingly preventable events (McNeil et al., 1991). The increasing rates of homicide, automobile accidents, and suicide have attracted research attention to both sudden and accidental adolescent death (Curran, 1987; La Greca, 1988) . Recent studies examining adolescent vulnerability to sexually transmitted diseases suggest an increased likelihood of adolescents' contracting the AIDS virus (DiClemente, 1990). Consequently, the anticipated death rate for this population is also likely to increase in coming years. With the overall increase

in the rate of death during the adolescent years, it is necessary for researchers to devote attention to understanding the unique grief reactions of survivors.

Developmental view of adolescence and death

Early developmental research in the area of death and dying devoted significant attention to the cognitive development of a death concept in childhood (e.g. Koocher, 1973, Nagy, 1948; Yalom, 1980). Death concepts were defined by the ability to achieve an understanding of death as irreversible, final, inevitable, and caused by external events (Cotton & Range, 1990). In general, these studies adopted a Piagetian framework, and concluded that by the age of ten, individuals will have fully developed a mature death concept (Kastenbaum & Aisenberg, 1972). Following these conclusions, many researchers have assumed that the adolescent understanding of death parallels that of the adult. Hence many thantologists have attempted to develop process models for grief, and have applied these to the general group of individuals over the age of ten (e.g. Freese, 1977; Kubler-Ross, 1969; Worden, 1981).

Kubler-Ross (1969) defines the grief process in terms of stages: shock, anger, guilt, bargaining, depression, and resolution. Heikkinen (1979) furthers this theory with the observation that these feelings may appear overtly, or they may be more covert, and take the form of irritability, restlessness, helplessness, apathy, or self-questioning. Spiegel (1977) provides a similar stage theory, involving phases of "shock", "control", "regression", and "adaptation" in bereavement. However, Spiegel's theory is slightly more precise in that it provides an estimated time frame for each of these stages. "Shock," characterized by the individual's psychic breakdown, begins at the time of death and lasts for several hours, or up to two days. "Control," marked by a loss thereof, when social institutions such as clergy or extended family control the bereaved individual, lasts until the funeral is completed. "Regression" covers the next ten weeks, and is hypothesized to be a time of vulnerability because of the "flood" of emotions that can occur. During this period, the individual searches for simple answers, and for a source on which to

place the responsibility of death. The final stage, "adaptation", is completed approximately three to five months later. It is important to note, however, that Spiegel does not define this point as the end of the grieving process, nor does he propose these stages as a "rule" of grief. Spiegel describes a "stabbing pain" that may linger following the adaptation stage, as the individual continues to experience selective memories. He labels his theory as the stages of "healthy" completion of grief, and emphasizes individual, and unpredictable variation.

Developmental literature documenting the many differences between adolescents and adults challenges these comprehensive models, suggesting that there might be unique facets of an adolescent's conception of death that distinguish it from an adult interpretation. For example, the adolescent's sense of his/her invulnerability ("it can't happen to me") may modify his/her understanding of death's universality (Noppe & Noppe, 1991). Few theorists, to date, have attempted to address this issue within the context of promoting a developmental model specifically aimed at the the adolescent population.

Davies (1991) attempted to provide a grounded theory for her retrospective research on adults who, in their early adolescence, lost a sibling. Davies proposed the following:

> In the months and years subsequent to the death of a brother or sister, bereaved siblings attribute increased psychological maturity to their encounter with death. The insights into life and death that account for this maturity also arouse in siblings a feeling of being "different" from others, particularly from their peers. When bereaved children are between 11 and 15 years of age at the time of the death, the sense of feeling different may be exacerbated due to the critical role of peer relationships in the successful completion of the developmental tasks of early adolescence. When bereaved siblings deal with their feelings of being different by withdrawing from their peer group, the potential exists for long-term negative effects of sibling bereavement. (p. 83-84)

This model served as the basis for Davies analysis of a series of semistructured interviews. Her conclusions followed the model: long-term outcomes included psychological growth, a sense of feeling different, and withdrawal from peers, which often resulted in sadness and loneliness.

Unfortunately, however, this model is designed to account for bereaved siblings who have reached adulthood, and would not be appropriate for general research on bereaved adolescents.

Noppe and Noppe (1991) propose a grander scheme for considering adolescent's understanding of death. These authors suggest that the grief of bereaved adolescents presents its own unique set of issues, which can be best described in terms of four dialectical themes: biological, cognitive, social, affective. Each will be discussed in turn.

The biological dialectic deals with the adolescent's physical and sexual maturation. According to this dialectic, at the same time as the individual reaches this physical apex, he/she is forced to confront the inevitability of biological decline. Adolescents may be more aware of aging parents and grandparents, and may use the image of these persons as a graphic depiction of their inevitable future. Noppe and Noppe (1991) suggest that adolescents may experience a disturbing contradiction between feeling so alive physically and knowing that they will cease to even exist one day.

The cognitive dialectic suggests that a fuller understanding of life's possibilities contrasts with the contemplation of death. Drawing on Piaget's literature on developing intellectual abilities, these authors suggest that the acquisition of "formal thought" which is said to occur in adolescence, presents the individual with a greater understanding of life's many possibilities. Such increasing sophistication in reasoning ability necessarily suggests thinking about death as well as about life. It is during this stage of development that individuals call into question their ideas regarding religion, spirituality, and ethics. Furthermore, this level of thinking permits adolescents to consider various alternatives for their futures. On one hand, they are challenged to envision a future of happiness, including marital and sexual partners, career, new friendships, traveling, and many other lively activities. On the other hand, they must also consider the possible negative aspects of their future, including death of loved ones, ending friendships, failure on the job, economic problems, and a host of other forms of loss (Noppe & Noppe, 1991). Thus, the

adolescent faces tension created by the juxtaposition of both optimistic and pessimistic components of the future.

The social dialectic involves tension between greater reliance on the peer group, and an increased sense of isolation. Whereas the constant scrutiny of the peer group and the demands for conformity create anxiety, rejection from other adolescents can be more devastating. Those individuals who cannot relate to their peers may suffer from "social death," defined as an increasingly limited interpersonal life (Noppe & Noppe, 1991).

The final dialectic suggested by Noppe and Noppe (1991) involves the emerging sense of identity, entangled with depression and the loss of self. This is referred to as the affective dialectic, and regards the adolescent's first confrontation, even hypothetically, with their own death. It is suggested that in order to create a knowledge of who one is, the adolescent must reconcile his/her identity with the ultimate disintegration and not being (Noppe & Noppe, 1991) .

Taken together, these four dialectics provide an interpretive schema for understanding bereavement during the adolescent years. However, this model regards adolescence as a general developmental phase, without taking into account the extreme differences among adolescents of different ages. For example, this model neglects to acknowledge the different conflicts and issues which arise for a twelve year old adolescent who is just finishing the seventh grade, and the eighteen year old who is just beginning college. Clearly these are very different developmental stages.

To date, only one model focuses on the different tasks and conflicts which present throughout the adolescent years. By adopting the viewpoint that adolescence consists of a series of tasks and conflicts, Fleming and Adolph (1986) have attempted to relate adolescent grief to the maturational process. In the first stage, between the ages of 11 and 14, the adolescent is said to be struggling with the issue of abandonment of his/her family in favor of his/her peer group, and reunion with his/her family for the purpose of safety. Between the ages of 14 and 17,

the adolescent's conflict revolves around issues of control, independence, and dependence. From the ages of 17 to 22, conflict arises over issues of intimacy and distance. During each of these stages, there are five basic issues around which bereaved adolescents attempt to resolve their conflicts: 1) mastery and control; 2) justice; 3) belonging; 4) self-image; and 5) predictability of life events. According to Fleming and Adolph's model, grief reactions to these core issues can reflect cognitive, behavioral, or affective domains, within any of the three developmental stages.

Given that this study focused exclusively on bereaved college students, between the ages of 18 and 22, this model is of particular use. According to the model, college students fall within the third phase of development (ages 17 to 22), during which the central task centers around issues of intimacy and distance, and the conflict reflects a dialectic between closeness and distance. These students have presumably achieved a degree of emotional and physical separation from their parents and are able to synthesize their personal and social identities from the context of the turmoil of the unknown. Their struggle centers on issues of interpersonal closeness. Too intimate a relationship creates the risk of being personally overwhelmed and dependent. Too distant a relationship risks isolation and abandonment.

Cognitively, adolescents at this stage are said to be dealing with issues of trust (Fleming & Adolph, 1986). These adolescents may be threatened by the discovery that events are not predictable: the world is unsafe because of vulnerability to death and fearing the death of another; loss of personal control is perceived if someone close cannot be protected from death. Self-image is marked by a sense of isolation: "No one has experienced what I have so no one will ever understand me." He/she may see life as having lost some of it's meaning if the individual saw belonging in another's life as defining life's purpose and that person is now gone. The adolescent may feel that the world is unfair and that goodness is not protection against all the evils of the world. And finally, the adolescent is likely to feel that he/she cannot risk trusting others because they too may eventually be "lost" (Fleming & Adolph, 1986).

These various cognitions manifest as an overall behavioral response of investment and withholding (Fleming & Adolph, 1986). Following the death of a loved one, these adolescents may strongly invest in another as an attempt to gain safety through alliance, attention, and affection. This investment may be so extreme as to appear "clinging." Furthermore, the individual's feelings of injustice may cause him/her to become invested in a cause, as opposed to an individual. Hence, these individuals may be seen to become extremely altruistic (Fleming & Adolph, 1986). However, this investment is likely to waiver with periods of withdrawal. During these periods the bereaved individual may refuse to have any help, any affection, or any praise.

Finally, college students who have lost a significant other are likely to experience feelings of anger, fear, rejection, alienation, and emptiness. Angry feelings may be directed inward or outward, leading to guilt and aggression. The individual may express a general sense of hostility toward the world for its injustice. He/she is likely to experience feelings of fear: fear of his/her own death, of the death of others, and of risking attachment to others. The fear of rejection is very strong in these individuals, and are likely to arise from their withdrawal from others, and their refusal to allow others to help them (Fleming & Adolph, 1986).

Given that the majority of college students are removed from their families by distance, it is clear that interpersonal peer relationships are essential to adolescents in the college population. This model suggests that the death of a significant other could have profound effects on these interpersonal relationships, and that these effects could be manifest through cognitions, behaviors, and affective states.

Death of a peer

Prevalence

Every decision is of great importance to the adolescent: what to say, what to wear, how to act, and how not to act (LaTour, 1983). The slightest decision is left open to criticism by the all-important peer group. With one unsteady foot in childhood and another unsteady foot reaching

out to adulthood, adolescents often turn to friends as the only voice of understanding (LaTour, 1983).

Given the importance of socialization within the peer group for helping adolescents create an identity and complete successful maturation (Zeltzer, 1980), it is surprising that so little research has been conducted into the reactions of adolescents to the death of a friend (McNeil et al.,1991). Studies of survivors of childhood and adolescent deaths have focused most often on parents (Bank & Kahn, 1975), with some growing emphasis on siblings (Balk, 1983; Davies, 1991; Fanos & ; Hogan, 1988; Hogan & Balk, 1990 ; Hogan & Greenfield, 1991; Nickerson, 1991; Spinetta, 1978). There is a paucity of research on the effects of the death of a friend in adolescence (Balk, 1991; McNeil et al., 1991; Sklar & Hartley, 1990), and only a slight increase in research efforts aimed at describing programs developed to deal with the implications of this problem (LaGrand, 1985; Zinner, 1987).

A 1980 study by Knott and Crafts estimated the rates of peer death for 18 to 22 year old people in the United States were just under 2 per 1,000. On a single college university campus, these authors discovered 25 student deaths over a three and one-half year period. In a study of multiple colleges across the United States, Wrenn (cited in Balk, 1991) found an estimate of 5,000 to 18,750 deaths were reported per year, with a range of 4 to 15 deaths per campus. Similarly, a 1990 survey conducted by Balk and McNeil (cited in Balk, 1991) concluded that over 30% of college students experienced the loss of a close friend over a 12 month period, and over 45% experienced such a loss within a 2 year period. Clearly, adolescent death is uncommon, but not unknown.

Consequences of peer death

When a young person dies, the bereavement of the family often takes precedence (Raphael, 1983), and friends of the deceased become "forgotten grievers" (Gyulay, 1975; LaGrand, 1985). Berardo (1988) has referred to peer bereavement in adolescence as a matter of

"disenfranchised grief." Friend's are often left with unanswered questions (Gyulay, 1975), and are expected to "get over it" sooner than family members (LaGrand, 1985).

The impact of a friend's death during adolescence is twofold: the bereaved adolescent must confront the loss of a loved one, and at the same time deal with his/her own shattered reality. Death becomes real. The realization that that there is mortality in this physical world can be frightening, and may heighten the adolescent's need for support (LaGrand, 1985). This support is not always available, as students often are deprived of family support by their distance from home, and must rely on peers who may not fathom the depth and meaning of death for him/her. Peers often withdraw from the bereaved person because of their own sense of inadequacy (Floerchinger, 1991), and those who intend to help, often complicate the student's grieving by imposing well-meant expectations for mourning: expressing opinions about what is and is not appropriate after a given period of time (LaGrand, 1985).

Review of research literature

Few researchers have focused on the specific reactions of adolescents to the death of a peer (Sklar & Hartley, 1990). Many have suggested that bereavement over the death of a friend closely parallels the mourning process experienced at the death of a sibling (Gyulay, 1975; Sklar & Hartley, 1987). However, these assertions seem somewhat premature, given the limited empirical data available on survivors of peer bereavement.

In 1990, Sklar and Hartly stated, "To our knowledge, there is no empirical study exploring the loss of a close friend through death..." (p. 103). In order to show that a hidden population of "survivor-friends" does indeed exist, and to then understand the dynamics of their survivor-friend population and their needs, these authors conducted the first exploratory studies of survivor-friends. These studies involved in-depth interviews and essays from college students who had lost close friends within the previous five years. These authors documented decreased coping abilities, premonitions, anger, feelings of "going crazy," guilt, anniversary syndromes, and visions in bereaved friends.

In 1991, McNeil et al. conducted an investigation of the bereavement responses of 96 adolescents who had lost a classmate to leukemia, eighteen months prior to the study. By administering a battery of short questionnaires, these authors were able to report shock, anger, a strong need to be with their friends, sadness, numbness, lack of appetite, and denial as the result of bereavement. However, this study was not designed as an empirical investigation, and therefore did not employ control groups or involve rigorous methodology.

Other researchers who have approached the area of adolescent bereavement in a more systematic fashion, have generally focused on the effects of generalized loss in adolescents. Rather than define "loss" as "death", some authors have expanded their definition to include such losses as the end of a love relationship, loss of a good grade, loss of a job, etc. (e.g. LaGrand, 1985). Furthermore, those who do limit their definition of loss to "death" often expand

their subject criteria to include those who have lost any significant other, including family members (e.g. Oltjenbruns, 1991; Pfost, Stevens, & Wessels, 1987,1989).

LaGrand (1985) conducted a survey of more than 3,000 students at sixteen colleges and universities in two states, for the purpose of determining the types of major losses encountered, the ensuing physical and psychological reactions, and the patterns of coping responses that students have used. Feelings reported in this study included depression, shock, emptiness, disbelief, helplessness, anger, loneliness, frustration, fear, guilt, denial, hatred, self-pity, rejection, and loss of self-confidence. Behaviorally, these students reported crying , tightness in the throat, choking, shortness of breath, lack of muscular power, headaches, insomnia, exhaustion, and nausea. The long-term effects of these responses often included impaired ability to fulfill academic obligations. Although discussing the details of the loss was cited as the most commonly used coping mechanism overall, LaGrand reports significantly more women were willing to discuss their losses than were men.

In 1989, Pfost et al. administered a battery of questionnaires to 40 undergraduate students who had sustained the death of a relative or friend within the past three years. These researchers found that a significant number of students reported experiencing feelings of despair, anger, guilt, social isolation, loss of control, rumination, depersonalization, somatization, and death anxiety. Based on their data, these authors suggest a correlation between feelings of intense anger and meaninglessness, and the tendency to rely on emotion-focused coping strategies. Although 42.5% of this sample reported the death of a friend, none of the data was analyzed to determine if differences existed between the loss of a relative and the loss of a friend. These authors controlled for the degree of emotional intimacy in all relationships, and choose to use this variable instead.

Finally, a 1991 study by Oltjenbruns examined the effects of grief in ninety-three late adolescents who had experienced the death of a family member or a close friend during the past 2

years. Subjects were included if they could identify their relationship with the deceased as "close." Data were not broken down to examine the impact of friend loss in contrast to relative loss. Of importance, Oltjenbruns was not interested in the behavioral outcomes of grief, but rather in the student's perception of positive outcomes that were the result of having experienced loss. Eighty-nine of the 93 subjects were able to identify at least one positive outcome, with the most commonly reported being the ability to have a deeper appreciation of life.

Summary

In sum, these studies have identified several variables which may be important in evaluating adolescents' reactions to death, including support, and coping. While preliminary results from several of these investigations appear promising, the need for future research, engaging more rigorous methodologies, is obvious. These studies, while examining adolescent bereavement, rarely separate out the effects of peer loss from the effects of generalized or familial loss. The lack of data regarding grief responses of peers strongly argues for more attention to this population.

In order to more fully understand the complexities of adolescent peer bereavement it is necessary to filter more generalized research to examine the specific phenomenon of peer loss in adolescence. Further, past findings need to be expanded by the exploration of additional variables which may be useful in understanding adolescents' grieving process, relative to peers. It is necessary to draw on findings from more fully explored areas of adolescent bereavement in order to identify additional meaningful variables. One possible source is the area of sibling grief.

Death of a sibling

Research regarding the effects of sibling loss has been far more expansive than that which has focused on the effects of peer loss. Numerous studies of adolescent grievers have elucidated descriptive accounts of grief reactions in response to sibling loss (e.g. Hogan, 1988). Many of these suggest that adolescents who experience the loss of a peer are likely to display

some of the same characteristics of sibling grievers, including depressed mood, poor school performance, withdrawal, aggression, and guilt (e.g. LaGrand, 1985). Researchers of sibling loss, however, have surpassed the symptom observation studies used to examine peer loss, by exploring the bereavement phenomenon with regard to some of the factors that influence grief responding. These variables include coping strategies (e.g. Stevens, Pfost, & Wessels, 1987), locus of control (e.g. Balk, 1990; Oltjenbruns, 1991), and gender differences (e.g. Parkes & Brown, 1972). In addition, some research in this area has moved beyond the examination of negative outcomes of bereavement, and has concentrated on some of the positive outcomes of the grief experience (Oltjenbruns, 1991).

Mediators of loss

Stress and Coping

By definition, a life event is stressful to the extent that it requires the individual to change or adapt his/her coping strategies to the frustrations, conflicts, and/or pressures brought about by the event (Coleman, Butcher, & Carson, 1984). Stress can be considered the result of an imbalance between the demands of the situation and the individual's appraisal of his/her coping options (Coleman, et al., 1984). The death of a close peer during adolescence threatens survivors with the knowledge that events are not predictable and that the world can be unsafe. Adolescents are challenged by a sudden loss of control when someone close cannot be protected from death, and no amount of effort or willing can reverse the situation (Fleming & Adolph, 1986). Hence, the death of a significant peer can be considered a stressor.

Individual differences in stress reactions are always apparent. These differences can be largely accounted for by the cognitive processes that characterize all interactions between individuals and stressors (Lazarus & Folkman, 1984). Lazarus & Folkman (1984) divided these cognitive processes into two sub-types: primary and secondary cognitive appraisal. In the former, the individual is said to look outward to assess the extent of harm or loss incurred, and the

potential for future harm or loss. Secondary cognitive appraisal involves both inward and outward searches to identify one's options for coping, and the likelihood that one will be able to apply a particular coping strategy effectively to reduce the negative effects of the situation.

It is this secondary form of cognitive appraisal that is of greatest concern to the present research. Past research into the area of coping with stressful life events has suggested that secondary cognitive appraisals are affected largely by one's evaluation of personal resources and interpersonal supports during the stressful situation (Folkman & Lazarus, 1984). The term "problem-focused coping" has been used to denote cognitive and behavioral efforts used to change the situation which is causing distress (Folkman & Lazarus, 1980). "Emotion-focused coping" refers to efforts to maintain the emotional and motivational control needed to regulate distressing emotions and sustain problem-focused coping (Folkman & Lazarus, 1980). Coping strategies are believed to affect both the intensity and the duration of negative stress responses. The more effective one is in using various strategies, the less intense the resulting stress reaction (Milgram, 1989).

In general, coping is said to refer to cognitive and behavioral efforts to master, reduce, or tolerate difficult person-environment relationships (Folkman & Lazarus, 1985). A 1980 study conducted by Folkman & Lazarus determined that problem-focused coping was generally used in encounters which were appraised by the individual as changeable. Emotion-focused coping strategies were used for those encounters which were appraised as unchangeable. More recent studies have determined that the coping strategies that individuals use in response to stressful life events vary with their physical, psychological, and social well being (Coyne, Aldwin, & Lazarus, 1981). Furthermore, studies have revealed a tentative association between emotion-focused coping and depression (Billings, Cronkite, & Moos, 1983). In a study conducted by Stevens et al. (1987), bereaved individuals who reported little purpose in life, reported having used more emotion-focused strategies to cope with the death of a significant other than did persons with

high purpose. Therefore, one purpose of this study is to examine the relationship of adolescents' problem and emotion-focused coping strategies, and symptoms of depression and hopelessness in response to grief.

Locus of Control

In late adolescent literature, locus of control has generally been correlated with depression, such that higher levels of depression are said to associate with more external locus of control (Burger, 1984, Siegel & Griffin, 1984). Furthermore, locus of control has been related to other emotions which are typically thought to relate to grief, such as anxiety and helplessness (Cash, 1984). Only one empirical study (Oltjenbruns, 1991) has specifically examined the relationship between this personality variable and adolescent grief. She identified 93 bereaved adolescents, who had experienced the loss of a relative or a close peer within a 2 year period. By investigating locus of control and positive outcomes of grief, she was able to identify significant differences in the types of positive outcomes internally and externally focused individuals attributed to their experience with grief. Specifically, more persons with an internal locus of control orientation reported that better communication skills were a positive outcome of their grief experience. However, these results must be examined with caution, as multiple chi-square analyses were computed with the data, thereby increasing the probability of making a Type I error. A second purpose of this study is to further examine the relationship between locus of control and adolescent reactions to grief.

Gender Roles

Several researchers have determined that there are differences in the way males and females manifest responses to grief. Parkes and Brown (1972) found that bereaved women experienced more somatic problems than bereaved men. Guerriero & Fleming (in Balk, 1991) discovered that female adolescents are more likely than males to report feelings of confusion, poor physical health, and great death anxiety following the loss of a sibling . Sanders (1979)

determined that bereaved women exhibited significantly more anxiety, anger, social isolation, somatic difficulties, depersonalization, and loss of appetite than bereaved men.

The results of these studies, indicating qualitative differences in the ways in which males and females process grief, have led some authors to question the impact of gender socialization. Cook (1988) has postulated that- unlike most other psychological research that uses male patterns as the paradigm (and judges female performance against that framework), studies of bereavement have generally adopted the female response pattern as the paradigm. Hence, male responses are judged to be inadequate when they differ from this female-norm. Rando (1988) has suggested that this bias is due to the fact that women are socialized to cope better with grief. Balk (1991) has argued that women and men merely differ in their display of emotion: whereas women tend to exhibit public displays of raw emotion, men tend to be more private. Such hypotheses lead one to question the impact of sex-roles on coping strategies employed to deal with grief. Given the assumption that adolescents are attempting to define their identity, sex-role adoption may be more indicative of gender socialization than would be biological gender. Hence, another goal of this study is to explore the effects of masculinity, femininity, and androgyny on adolescent grief responding.

Beliefs about the World

One other area that has emerged with regard to death and dying has focused on the impact of death on one's fundamental beliefs about the world and one's self. In several papers, Janoff-Bulman (e.g. Janoff-Bulman, 1989; Janoff-Bulman & Frieze, 1983) has argued the stress of traumatic events can be accounted for by the severe challenge they pose to the victim's basic assumptions. Essentially, fundamental ideas which had gone unquestioned prior to the traumatizing event are destroyed by the trauma, and the individual loses some of his/her sense of stability (Janoff-Bulman, 1989). Coping, therefore must involve some alteration in these basic assumptions so that they can take into account the individual's recent experience.

Predominantly, these assumptions have been examined with regard to victims of crime, disease, and serious accidents (e.g. Janoff-Bulman, 1989), and it has been found that these assumptions about the benevolence of the world, meaningfulness of the world, and self-worth do differ for victims and nonvictims. Recently, however, researchers have examined the changes triggered by bereavement over the loss of a parent. In a study of 21 bereaved college students who had lost a parent within 3 years prior to the study , it was found that bereaved individuals find the world to be less just and more random than their nonbereaved peers. No differences were found with regard to benevolence of the world, or self-worth. A fourth purpose of this study is to attempt to expand upon this initial work by exploring the impact of peer death on world assumptions.

Purpose

In general, our society emphasizes fraternal and paternal bonds in times of adolescent loss. The immediate family is encouraged to grieve, and is supported throughout the process. Researchers have traditionally followed the norms of society by focusing on family members, their feelings, thoughts, and behaviors. Friends of the deceased have largely been overlooked. All too often students are expected to "bounce back" quickly from death experiences outside of the immediate family.

If students suffering the aftermath of major loss experiences are to be provided with support assistance, it is necessary to first recognize the impact of such a loss. The death of a friend has not received the research attention that is necessary to provide a full understanding of this event, its impact and implications over time. Empirical findings must be integrated with an interpretive schema so that peer bereavement during adolescence can be better understood.

Hypotheses

1. Bereaved subjects are expected to rely more on "seeking social support," "distancing," "self-controlling," "positive reappraisal," and "escape-avoidance" as coping strategies than nonbereaved subjects.

2. Bereaved subjects are expected to rely less on "planful problem solving," "accepting responsibility," and "confrontive coping" as forms of coping than nonbereaved subjects.

3. Bereaved subjects are expected to score higher on a scale of morality then nonbereaved subjects.

4. Bereaved subjects are expected to have fewer assumptions about the meaningfulness of the world, the benevolence of the world, and about their own self-worth than nonbereaved subjects.

5. Bereaved subjects are expected to score lower on the global self-worth scale then nonbereaved subjects.

6. Bereaved subjects are expected to report more health problems than nonbereaved subjects.

7. Females are expected to report more health problems than males.

8. Bereaved subjects who report more satisfaction with social support are expected to use different coping strategies than those who report less satisfaction.

9. Bereaved subjects who report more available social support are expected to evidence fewer grief symptoms than those who report little available support.

10. Bereaved subjects who report more satisfaction with social support are expected to evidence fewer grief symptoms than those who report little satisfaction.

11. Bereaved subjects with an internal locus of control are expected to report fewer grief symptoms than individuals with and external locus of control.

12. Bereaved subjects with and internal locus of control are expected to utilize different coping strategies than those with an external locus of control.

13. Bereaved with an external locus of control are expected to report fewer benevolence-of-the-world assumptions than subjects with an internal locus of control.

14. Bereaved subjects with an androgynous gender-role are expected to show fewer grief symptoms than subjects with either a masculine or feminine gender-role.

15. Bereaved subjects with a feminine gender-role are expected to show different grief symptoms than subjects with a masculine gender-role.

Materials and Methods

Subjects

The participants consisted of 102 college undergraduates, fifty of whom had experienced the death of a peer in the 3 years prior to the study. The remaining 52 subjects served as controls, as they had experienced no such loss. All of the subjects were between the ages of 18 and 22, with a mean age of 18.63 years. Forty-nine subjects were male and 53 subjects were female. Eighty-eight subjects were Caucasian, 5 were Black, 8 subjects were Asian, and 1 subject was Hispanic. Two subjects were eliminated from the study: One subject identified her mother as the friend who she had lost, and another identified a peer with whom she had minimal involvement and indicated no emotional trauma due to the death.

Recruitment

All respondents were recruited from an introductory psychology pool at Virginia Polytechnic and State University (see Appendix A), . Students were asked to leave their name in an envelope in a specified location, or to call the primary investigator. Extra credit was awarded to all participants, according to the Introductory Psychology credit guidelines: One extra credit point given for each hour, or part of an hour, required to complete the questionnaires.

Measures (see Appendix B)

Information Sheet

Subjects were asked to complete an information sheet indicating age, sex, relationship to the deceased, sex of deceased, number of months since loss, and cause of death ("Not applicable" was be an available response for control group participants.)

Bereaved subjects were also asked to rate both their emotional trauma in response to the loss and the intimacy of their relationship to the deceased on a 7-point Likert-type scale ranging from "none-0" to "extreme-7." Following the procedure adopted by past researchers in this area

(Pfost et al., 1989), only data obtained from students who reported levels above 4, on both of these scales, were included in the study.

Ways of Coping Checklist (WOC)

The revised WOC (Folkman & Lazarus, 1988) is a 66-item Likert-type instrument designed to identify strategies used to cope with a stressor specified by the participant. The instrument samples commonly used strategies, including defensive coping, information seeking, inhibition of action, direct action, magical thinking, palliation, and problem-solving, and it has been divided into problem-focused and emotion-focused scales. The internal consistency of each scale has been reported at .80.

Self-Perception Profile for College Students (SPCS)

The SPCS (Neemann & Harter, 1986) includes three inventories, of which one has been selected for the purpose of this study. The first inventory, entitled "What I am like," consists of 72 items designed to tap college student's self-rating of their global self-worth in 12 specific domains: Creativity, Intellectual Ability, Scholastic Competence, Job Competence, Athletic Competence, Appearance, Romantic Relationships, Social Acceptance, Close Friendships, Parent Relationships, Humor, Morality, and a Global Self-Worth rating. All items ask the student to select which one of two self-descriptions are "Really true for me or Sort of true for me." Items are scored on a 1-4 scale where 4 represents the most competent or adequate self-judgement. Internal consistency assessed by coefficient alphas for the "What I am like" inventory were reasonably high , with only one scale below .80.

World Assumptions Scale (WAS)

The WAS (Janoff-Bulman, 1989) is a 32 item Likert-type instrument designed to assess an individual's assumptive world. The WAS focuses on three major categories of assumptions: the benevolence of the world, the meaningfulness of the world, and the worthiness of the self. Each of these scales is made up of items representing more specific beliefs. Thus, the

"Benevolence of the world" scale taps the benevolence of people and the benevolence of the impersonal world; the "Meaning" scale taps an individual's beliefs in justice, control, and randomness; and the "Self-worth" scale taps beliefs about self-esteem, personal control and luck. Respondents are required to rate the extent of their agreement with items on a 6-point scale, ranging from "strongly disagree" to "strongly agree." Alpha coefficients for the WAS have been reported at .87 for the "Benevolence of the world" scale, ".76 for the "Meaningfulness of the world" scale, and .80 for the "Self-worth" scale.

The Pennebaker Inventory of Limbic Languidness (PILL)

The PILL is a 54 item checklist of physical symptoms and complaints (Pennebaker, 1982). Each item is scored on a 5-point, Likert-type scale, with endpoints "have never or almost never experienced the symptom" and "more than once every week." Responses are summed across items for a total score. The validity of this measure is indicated by findings that high scorers make more physician and health center visits and have more health-related work absences than low scorers.

Social Support Questionnaire (SSQ)

The SSQ is a 27-item scale to assess perceived availability and satisfaction with social support (Sarason, Levine, Basham, & Sarason, 1983). To assess availability of support, subjects are asked to list people available in times of need. For each item assessing availability of support, subjects indicate their satisfaction with support received on a 6-point scale ranging from "very dissatisfied" (1) to "very satisfied" (6). Total scores are obtained for number and availability of supporters. Sarason et al. (1983) reported test-retest reliability coefficients of .90 for number and .83 for satisfaction. Internal consistency coefficients for number and satisfaction were .97 and .94, respectively.

Rotter's Locus of Control (LOC)

The LOC (Rotter cited in Phares, 1976) is a forced-choice scale containing 29 items, including six irrelevant items to conceal the purpose of the scale. Questions focus on the subject's subjective appraisal of how reinforcement is controlled, concentrating on the value the individual places on internal and external control.

Grief Experience Inventory (GEI)

The GEI (Sanders, Mauger, & Strong, 1979) is a 135 item, true-false questionnaire designed to assess multidimensional and longitudinal experiences that characterize the grieving process. The GEI has nine bereavement scales that measure discrete components of the grief experience, including despair, anger, guilt, social isolation, loss of control, rumination, depersonalization, somatization, and death anxiety. The GEI has been found to distinguish mourners from non-mourners at the .001 level on all scales. The internal consistency of the scales ranges from .52 to .84.

Bem Sex-Role Inventory (BSRI)

The BSRI (Bem, 1981) was designed to implement empirical research on psychological androgyny. It contains sixty personality characteristics: 20 stereotypically feminine, 20 stereotypically masculine, and 20 filler items. Subjects are asked to indicate on a 7-point scale how well each of the 60 characteristics describes herself or himself. On the basis of these responses, subjects are then characterized as having feminine, masculine, androgynous, or undifferentiated sex roles. Internal consistency, estimated by coefficient alpha ranged from .75 to .87.

Procedure

Assessment

All subjects were run in a group format. When subjects arrived for testing, the purpose of the study was further explained to them (see Appendix C), and they were asked to sign a consent

form (see Appendix D) for participation. The consent form included a space for students to indicate whether or not they were interested in further information about counseling services. Two students indicated "yes," and were contacted by the primary investigator, and referred to the Virginia Tech counseling center. A two week follow-up indicated that both subjects had pursued counseling.

All subjects were informed that any information received during the course of the study would remain strictly confidential. Subjects were offered a copy of the consent form if they so desired. Subjects then completed all questionnaires at their own pace. They were then given the opportunity to ask any questions they might have had. Subjects were thanked for their time, and given extra credit receipts.

Results

Demographic Variables

Fifty bereaved and 52 nonbereaved individuals were comparable on the major demographic variables of age, gender, and race, as well as on sex roles and locus of control. A series of two-way analyses of variances (ANOVA's) revealed that males and females did not significantly differ on any variable. Given that no significant main effects due to gender , nor significant interactions between gender of bereaved subjects and gender of deceased peer, were found; gender was no longer considered in the analyses. The demographic variables and group differences in sex roles and locus of control are listed in Table 1.

Insert Table 1 about here

Between Group Analyses: Comparisons between the bereaved and nonbereaved groups

To protect against spurious findings resulting from multiple tests in subsequent analyses, a multivariate analysis of variance (MANOVA) was performed to investigate the effect of group (bereaved, nonbereaved), which served as the independent variable, on the dependent variables of coping strategies, self-perception, social support, and world assumptions. There was a significant group effect ($\sqrt{\ }$ = .836, F (8, 93) = 2.287, $p < .05$) indicating significant differences in one or more of the coping strategies used by bereaved and nonbereaved individuals. Similarly, a significant group effect on self perception was also obtained ($\sqrt{\ }$ = .632, F (12,88) = 4.274, $p < .001$), as was a group effect for assumptions ($\sqrt{\ }$ = .729, F (3, 98), $p <$ .001). However, the group effect for social support was not significant ($\sqrt{\ }$ = .904, F (6, 95) = 1.672, $p = .136$) indicating that any univariate findings with respect to group on social support should not be interpreted, or should be interpreted with caution.

Table 1. Demographics and Independent Predictors

Characteristic	Bereaved	Nonbereaved
N	50	52
Age Mean (SD)	18.56 (1.31)	18.71 (1.42)
Gender		
Male	29	20
Female	21	32
Race		
Caucasian	44	44
Black	2	3
Asian	3	5
Hispanic	1	0
Sex Role		
Masculine	4	9
Feminine	7	7
Androgynous	18	13
Undifferentiated	21	23
Locus of Control		
Internal	24	22
External	26	30

Abbreviations: SD, standard deviation

Significant MANOVAs were followed by t-tests, using Bonferroni critical values when appropriate. Table 2 illustrates the results of one-tailed t-tests comparing the use of coping strategies by bereaved and nonbereaved subjects. Significance was obtained on the "self-controlling" factor, indicating the nonbereaved subjects (M = 1.543) were more likely than bereaved subjects (M = 1.148) to attempt to regulate their own feelings and actions in response to a stressful event (t (100) = 3.381, p < .001). Nearly significant differences were found with regard to the use of "escape-avoidance", "seeking social support", and "planful problem solving" strategies. Bereaved subjects were more likely to utilize escape strategies and less likely to rely on others or to engage in planful problem solving than nonbereaved subjects.

Insert Table 2 about here

Table 3 illustrates the results of two-tailed t-tests examining differences in self-perception of bereaved and nonbereaved subjects. Significant differences were found on the "morality" factor (t (100) = -6.082, p < .001), suggesting that when compared to their nonbereaved (M = 3.038) counterparts, the bereaved (M = 3.714) group believe that their behavior is more moral . No significant differences were found on any other self-perception factor.

Insert Table 3 about here

Significant differences between the two groups emerged on the "meaning" subscale of the WAS, and nearly significant findings were found with regard to the "self-worth" subscale. Compared with nonbereaved (M = 47.231) subjects, the bereaved (M = 39.521) individuals believe in a less meaningful world (t (100) =5.651, p < .001). Further, there is some indication that the bereaved (M = 42.163) subjects have a lower sense of "self-worth" than their

Table 2. Differences Between Bereaved and Nonbereaved Groups on Coping Strategies

	Bereaved Group Mean (SD)	Non-bereaved Group Mean (SD)	t-value	df	p (1-tail)
Coping Strategies					
Accepting responsibility	1.065 (.726)	1.193 (.615)	1.085	100	.1403
Escape-avoidance	1.397 (1.012)	.915 (832)	2.434	100	.0083*
Seeking social support	1.260 (.724)	1.599 (.782)	2.373	100	.0097*
Self-controlling	1.148 (.525)	1.543 (.646)	3.381	100	.0005**
Distancing	1.003 (.670)	1.117 (.658)	.987	100	.1629
Confrontive coping	.857 (.579)	1.016 (.732)	1.214	100	.1139
Positive reappraisal	1.412 (.611)	1.550 (.692)	1.068	100	.1440
Planful problem solving	1.037 (.698)	1.367 (.707)	2.450	100	.0080*

Abbreviation: SD, standard deviation

* Significant at critical value, $p < .01$

** Significant at Bonferroni Critical Value, $p < .00625$

Table 3. Differences Between Bereaved and Nonbereaved Groups on Self-Perception

	Bereaved Group Mean (SD)	Non-bereaved Group Mean (SD)	t-value	df	p (2-tail)
Self-Perception					
Global Self-Worth	3.265 (.670)	3.115 (.676)	-1.119	100	.2660
Creativity	3.000 (.736)	3.154 (.668)	1.101	100	.2736
Intellectual Ability	3.184 (.727)	3.327 (.648)	1.047	100	.2978
Scholastic Competence	2.878 (.600)	2.827 (.648)	-.407	100	.6851
Job Competence	3.380 (.635)	3.250 (.622)	-1.044	100	.2990
Appearance	2.380 (1.028)	2.654 (.814)	1.343	100	.2036
Romantic Relationships	2.878 (.666)	2.827 (.774)	1.518	100	.1322
Social Acceptance	3.102 (.918)	3.115 (.676)	.083	100	.9336
Close Friendships	3.306 (.822)	3.327 (.678)	.139	100	.8897
Parent Relationships	3.143 (.643)	3.135 (.760)	-1.886	100	.0622
Humor	3.143 (.764)	3.135 (.715)	-.056	100	.9554
Morality	3.714	3.038	-5.978	100	.0001*

Abbreviation: SD, standard deviation
* Significant at Bonferroni critical value, $p < .0041$

nonbereaved (M = 49.692) counterparts (t (100) = 1.908, p = .051), suggesting lower feelings of self-esteem, personal control, and luck. As evidenced in Table 4, these subjects did not differ in terms of other assumptions about the world or themselves.

Insert Table 4 about here

Finally, a one-sided t-test using group as the independent variable and health score as the dependent variable revealed no significant differences (M = 118.469 vs. M = 112.423, t (100) = -1.238, p = .218).

Within-group analyses: Associations within the bereaved group

Table 5 presents the characteristics of the losses experienced by bereaved subjects. All 50 bereaved participants were administered questionnaires within a median of 15 months of the death of a friend, with a range of 2 to 30 months. A 2x2 ANOVA using time since loss and cause of death as independent variables, and grief symptoms and coping strategies as dependent variables, revealed no significant effects.

Insert Table 5 about here

Pearson product moment correlations were calculated between satisfaction with social support and coping strategies. No significant findings were evident.

Insert Table 6 about here

Pearson product moment correlations were calculated between the social satisfaction score and each of the grief scales, including the grief composite score. A t-test, using Bonferroni

Table 4. Differences Between Bereaved and Nonbereaved Groups on World Assumptions

	Bereaved Group Mean (SD)	Non-bereaved Group Mean (SD)	t-value	df	p (2-tail)
World Assumptions					
Meaningfulness of the World	39.521 (7.495)	47.231 (6.252)	5.651	100	.0001**
Benevolence of the World	33.020 (6.956)	34.673 (7.587)	1.146	100	.2421
Self-Worth	46.300 (9.298)	49.692 (8.651)	1.971	100	.0592

Abbreviation: SD, standard deviation
** Significant at Bonferroni critical value, $p < .0166$

Table 5. Characteristics of Loss

Months since Loss		
	Mean	10.72
	Standard Deviation	4.15
	Minimum	2
	Maximum	30
Cause of Death (N)		
	Homicide	1
	Automobile Accident	27
	Long-term Illness	16
	Accidental Drug Overdose	6
Interaction of Sex of Bereaved and Sex of Deceased (N)		
	Male-Male	21
	Male-Female	8
	Female-Male	16
	Female-Female	5

Table 6. Correlations Between Satisfaction with Social Support and Coping Strategies

Coping Strategy	r	p
Planful Problem Solving	.104	.4727
Positive Reappraisal	.127	.3813
Confrontive Coping	.039	.7866
Distancing	.195	.1739
Self-Controlling	.104	.4718
Seeking Social Support	.023	.8767
Accepting Responsibility	.169	.2395
Escape-Avoidance	.042	.7699

critical value $p < .005$, was calculated for each individual correlation. Correlations proved significant for despair ($r = -.507$, $p < .001$), anger ($r = -.614$, $p < .001$), social isolation ($r = -.461$, $p < .001$), loss of control ($r = -.372$, $p < .01$), rumination ($r = -.496$, $p < .001$), depersonalization ($r = -.419$, $p < .01$), somatization ($r = -.454$, $p < .001$), and for the composite grief score ($r = -.656$, $p < .001$). While satisfaction with social support had no impact on death anxiety or guilt, subjects reporting low satisfaction did experience an overall increase grief symptoms, and did experience more intense levels of several of the grief symptoms.

Insert Table 7 about here

Grief symptomology was also compared to the **amount** of social support bereaved persons reported that they received from various individuals or groups. No significant differences were found. Further analyses of social support were completed to determine whether individuals who reported more satisfaction with social support and/or who reported more received social support would differ in the coping strategies used to deal with their loss. No significant differences were found.

Locus of control

A MANOVA was performed to investigate the effect of locus of control on grief symptoms and coping strategies, where locus of control served as the independent variable and grief symptoms and coping strategies served as dependent variables. The MANOVA for the effect of locus of control on grief symptoms was significant ($\sqrt{\ } = 295$, $F(10,39) = 9.316$, $p < .001$), indicating significant differences in one or more of the grief symptoms experienced by individuals with internal and external locus of control. The MANOVA for the effect of locus of control on coping strategies used to deal with the effects of the loss of a peer was not significant ($\sqrt{\ } = .797$, $F(8,41) = 1.303$, $p = .269$), indicating that any univariate findings with respect to an

Table 7. Correlations Between Satisfaction with Social Support and Grief Scales

Grief Sub-Scale	r	p
Despair	-.507	.0002**
Anger	-.614	.0001**
Guilt	-.173	.2291
Social Isolation	-.461	.0008**
Loss of Control	-.372	.0079*
Rumination	-.496	.0003**
Depersonalization	-.419	.0024**
Somatization	-.454	.0009**
Death Anxiety	-.099	.4950
Composite Score	-.656	.0001**

* Significant at critical value, $p < .05$
** Significant at Bonferroni critical value, $p < .005$

effect of locus of control and coping strategies should not be interpreted, or should be interpreted with caution.

The significant MANOVA for locus of control and grief symptoms was followed by one-tailed t-tests, using Bonferroni critical value $p < .005$. Significance was obtained on several factors, including despair, anger, loss of control , rumination, depersonalization, somatization, and also on the grief composite scale (see Table 7). In all cases, subjects who have an external locus of control reported significantly greater symptom expression than those subjects who have an internal locus of control. Nearly significant differences were found on the remaining factors of guilt, social isolation, or death anxiety; however, these differences were not quite strong enough to be significant at the stringent Bonferroni p-criterion of .005.

Insert Table 8 about here

As predicted, subjects with an external locus of control ($\underline{M} = 31.269$) reported significantly weaker benevolence of the world assumptions than subjects with an internal locus of control ($\underline{M} = 34.917$, one-tailed $\underline{t}\ (49) = -1.901$, $\underline{p} < .05$). Further analyses of assumptions indicated that subjects with an external locus of control ($\underline{M} = 43.923$) also reported a lower sense of self-worth than subjects with an internal locus of control ($\underline{M} = 48.875$, $\underline{t}\ (49) = -1.933$, $\underline{p} < .05$), and that externals ($\underline{M} = 36.423$) believed in a less meaningful world than internals ($\underline{M} = 42.875$, $\underline{t}\ (49) = -3.324$, $\underline{p} < .01$).

Insert Table 9 about here

A linear contrast was used to investigate the hypothesis that subjects classified with an androgynous sex-role would show fewer grief symptoms than the average of masculine or

Table 8. Relationship Between Locus of Control and Grief Symptoms

Grief Sub-scale	Internal LOC Group (SD)	External LOC Group (SD)	t-value	df	p (1-tail)
Despair	40.667 (4.093)	52.115 (9.581)	5.413	49	.0001**
Anger	39.417 (12.434)	57.923 (11.342)	5.504	49	.0001**
Guilt	45.750 (8.061)	52.346 (10.480)	2.479	49	.0083*
Social Isolation	44.750 (9.525)	52.692 (11.798)	2.606	49	.0061*
Loss of Control	46.750 (8.028)	58.731 (9.067)	4.930	49	.0001**
Rumination	43.667 (8.339)	59.115 (13.657)	4.778	49	.0001**
Depersonalization	47.708 (7.262)	57.885 (5.666)	5.548	49	.00005**
Somatization	27.542 (5.532)	43.192 (16. 989)	4.304	49	.0001**
Death Anxiety	51.250 (10.796)	56.769 (9.026)	1.967	49	.0275
Grief Composite	387.500 (28.608)	490.769 (47.885)	9.159	49	.0001**

Abbreviations: SD, standard deviation; LOC, locus of control
* Significant at critical value, $p < .05$
**Significant at Bonferroni critical value, $p < .005$

Table 9. Relationship Between Locus of Control and World Assumptions in Bereaved Adolescents

World Assumption	Internal LOC Group (SD)	External LOC Group (SD)	t-value	df	p (1-tail)
Benevolence of the world	34.917 (5.524)	31.269 (7.754)	- 1.901	49	.0316*
Self-Worth	48.875 (8.29)	43.923 (9.695)	- 1.933	49	.0295*
Meaningfulness of the world	42.875 (7.798)	36.423 (5.777)	-3.324	49	.0008**

Abbreviations: SD, standard deviation; LOC, locus of control
* Significant at critical value, $p < .05$
**Significant at Bonferroni critical value, $p < .0166$

feminine subjects. No significant differences were found. Further, analyses of variance used to investigate the effect of sex-roles on coping mechanisms and sex roles on grief symptoms revealed no differences.

Discussion

The purpose of this study was to investigate the impact of the death of a peer during adolescence. Past research in the areas of sibling, parental, and generalized loss provided the basis for exploring the impact of many variables, including coping strategies, support, and general assumptions about the world and individuals. However, this is one of the few studies to look specifically at the event of peer loss. Further, this study extended the current literature by exploring the potential mediating roles of locus of control and gender-roles as they impact the adolescent grieving process. In general, bereaved individuals were found to differ from their nonbereaved peers in the ways that they perceived themselves and the world. These differences in perception accounted for a great deal of variance within the bereaved group as well. When bereaved individuals were able to maintain a more positive view of their support resources, their personal worth, their ability to control their lives, and the existence of a just world, they were better able to cope with their loss.

Coping

The first two hypotheses in this study predicted that bereaved and nonbereaved individuals would differ in the strategies they used to cope with stressful life events. Specifically, we expected bereaved individuals to rely on coping strategies which were emotion-focused, such as distancing themselves from the stressor, seeking social support, relying on self-control, using positive reappraisal of the situation, and/or depending on escape-avoidance strategies. In contrast, we anticipated that the nonbereaved individuals would tend to utilize more problem-focused strategies, such as accepting responsibility for the identified situation, engaging in confrontation, or using planful problem solving skills. Our hypotheses followed logically from research suggesting an association between emotion-focused coping and depression (e.g. Billings, Cronkite, & Moos, 1983). However, the results provided mixed findings.

When the bereaved adolescents were compared to their nonbereaved peers, few differences emerged. Adolescents who had experienced the death of a peer seemed to rely significantly less on "self-controlling", as a coping strategy, than did their nonbereaved peers. Although this finding is inconsistent with data from the area of depression in adults (e.g. Billings et al., 1983), several possible explanations may be found in literature addressing the specific responding of adolescents.

In an exploratory study of adolescent coping methods, Puskar & Lamb (1991) found self-control as the most frequently cited method used to deal with common stressors, such as breaking up with a boyfriend/girlfriend, arguing with parents, and changing relationships with friends. In our study, nonbereaved subjects were requested to select a personal stressor . Everyday stressors, such as broken romances and fights with parents, made up more than 60% of the responses (see Figure 1). Hence, these subjects were often responding to everyday stressors (events within the range of normal experience) and thus reacted in characteristic ways, according to these authors. Given that bereaved subjects were told to answer the coping questionnaire with regard to their experience with the death of a significant peer, it is not surprising that the coping responses of these adolescents would differ.

Alternatively, one might explain this difference in terms of cultural expectations for grieving. During adolescence, individuals are very much concerned about the expected "normal" response to loss because they are overly concerned about being considered different or abnormal (Garber, 1985). Sadness and anger expressed in the form of tears, screams, tantrums are all considered "healthy" reactions immediately following the death of a significant other. However, such emotional displays are not generally considered acceptable reactions to lesser stressors (e.g. fight with one's parents) and therefore the level of self-control in such instances makes sense.

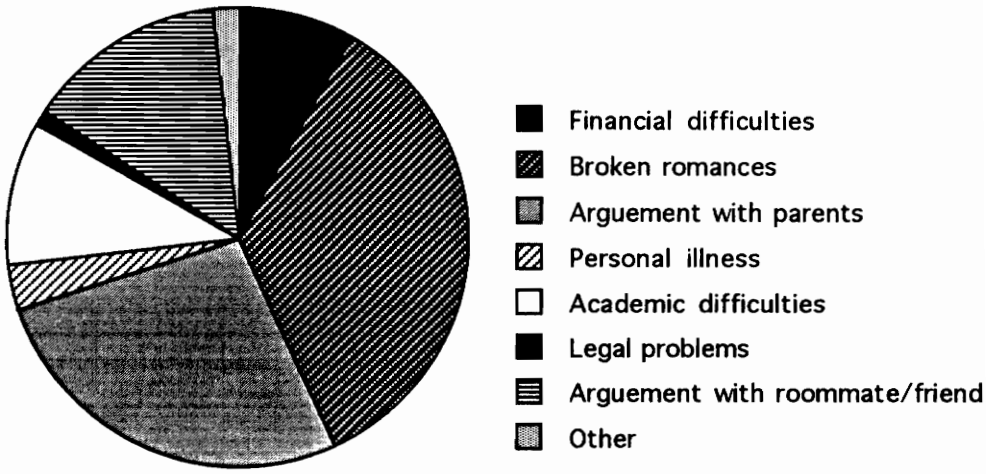

Figure 1. Stressors reported by nonbereaved adolescents

In partial support of hypothesis two, bereaved students indicated that they would be less likely to use "planful-problem-solving" and "accepting responsibility". The lack of reliance on "planful-problem-solving" skills and "accepting responsibility" in bereaved adolescents might largely be explained by the nature of the stressor targeted. That death was the identified stressor, no amount of problem-solving would reverse the situation. Statements such as, I "changed something so things would turn out all right" or I "came up with a couple of different solutions to the problem" were not appropriate for this situation. However, the nonbereaved students, whose stressors varied considerably, might have found such planful problem solving strategies as effective coping efforts. Similarly, not accepting responsibility for the peer's death may have been quite adaptive for bereaved individuals.

In summary, while several findings within hypotheses one and two were confirmed as predicted, several were not. Similarly, hypothesis eight, which predicted a relationship between "satisfaction with social support" and coping strategies, and hypothesis twelve which predicted a relationship between "locus of control" and coping were also disconfirmed.

One explanation for this lack of congruence concerns the methodology used to measure coping in this study. The measure employed to assess cognitive-behavioral coping strategies was a self-report rating scale developed by Folkman and Lazarus (1980, 1985). Waller (1989) pointed out that such behavioral rating scales often contain items that are inapplicable to specific individuals in certain situations, and that the presence of a small to moderate percentage of inapplicable item responses can seriously obfuscate data analyses. Following this critique, Ben-Porath, Waller, and Butcher (1991) examined the content of the "Ways of Coping" scale to determine if inapplicable items were indeed present, and if so, if these items affected the accuracy of studies of situational effects on coping. The results of this study revealed a significant effect due to inapplicability.

With regard to the present study, the problem of inapplicability arose on several occasions during administration of the Ways of Coping Scale. For example, one of the students who participated was recovering from an automobile accident which had resulted in a broken jaw, and which required an extended stay in the hospital for reconstructive surgery. This student had difficulty answering several items on the escape-avoidance scale; for example, "Tried to make myself feel better by eating, drinking, smoking, using drugs or medication, etc." and "Avoided being with people in general." The fact that he did not seek out others or engage in oral behaviors bears no relevance to the extent to which he relied on the escape-avoidance coping strategy in coping with this particular stressor. However, these two items comprise one-fourth of the questions on this scale. Hence, item inapplicability may largely account for the counter-intuitive findings with regard to coping across bereaved and nonbereaved subjects.

Hypothesis four maintained that bereaved subjects would report fewer beliefs in the meaningfulness of the world, poorer sense of self-worth, and would perceive less benevolence in the world. Again, our results were mixed. Compared to nonbereaved subjects, the bereaved subjects did maintain fewer assumptions about the meaningfulness of the world and produced fewer assumptions about their own self-worth; however, this latter finding was only marginally significant. These findings are consistent with past research suggesting that the death can alter basic assumptions about the meaningfulness of the world and the related perception of chance (Schwartzberg & Janoff-Bulman, 1991). However, these individuals did not differ with regard to their perceptions of benevolence in the world.

The loss of a significant peer challenges the belief that many adolescents maintain; namely, that they are invulnerable. Suddenly, they are forced to face the fact that the world is not predictable, and that they cannot always protect themselves or others from death. Bereaved adolescents experience a disruption in the ability, found in the nonbereaved adolescents, to explain events with such standard concepts as justice and control. They discover that the world

can be unfair and that goodness is not protection against all the evils of the world. For these adolescents, events come to be seen as more random, people are viewed as having less control over their own fate, and chance becomes acknowledged as a force to be recognized. Those adolescents who were able to minimize the disruption of their beliefs were able to minimize the traumatic impact of the death of the peer. Particularly, those individuals who were able to make sense of the loss, in terms of why certain things happen to certain people, spent less time ruminating about the loss, experienced little depersonalization, and felt less guilty and out of control.

It is unclear, given the limits of this study, what processes enabled certain adolescents to preserve their assumptions about why certain things happen to certain people, while others could not. In a few cases, where the cause of death was the result of negligence on the part of the deceased (e.g. drug overdose) one might speculate that the survivor-friend, was able to "justify" the death. However, many of the losses reported by the students in this study resulted from illness or accidents. In such cases, it is possible that the survivor-friend was able to explain or understand the death by holding on to or even strengthening the rules with which he/she had previously made sense of the world. Support for this hypothesis can be largely obtained from literature on the function of illusions for maintaining well-being (e.g. see Taylor & Brown, 1988). This literature has elucidated the tendency of individuals to create positive, life-affirming illusions to enable them to cope with their own existential terror, and with the uncertainty in the world. Illusions of control, and self-affirming biases are both common reactions to fear. In the case of adolescent peer-loss, it is possible that those who were able to minimize their grief were most effective in creating illusions to help them gain mastery and control of the chaos around them.

An alternate explanation for why some students seemed to be more effected by the disruption of their beliefs about the world, might relate to the concept of locus of control. Locus of control is a construct which refers to people's ability to relate their own behavior to its outcome,

and consequently learn to increase their feelings of control over outcome expectancies. In addition, behavior is dependent upon the expectancy of obtaining reinforcement contingencies. Internals, therefore anticipate that their own behaviors will help to determine outcome, whereas externals feel that outcome depends on chance or luck. This notion was confirmed and will be discussed below in the context of hypotheses twelve and thirteen which targeted locus of control.

Locus of control

Hypothesis eleven in the current study proposed that subjects with an internal locus of control would be less vulnerable to the impact of death than would subjects with an external locus of control. Particularly, hypothesis eleven predicted that bereaved subjects with an internal locus of control would report fewer overall grief symptoms than those with an external locus of control. This hypothesis which was based on the assumption that internals' general belief in personal control would insulate them from the feelings of hopelessness that externals might experience when faced with a stressor, was confirmed. External subjects were found to report significantly higher levels of despair, anger, guilt, social isolation, loss of control, rumination, depersonalization, and somatization then their internal counterparts, and appeared to have more difficulty believing in a "just world", where people get what they deserve (see Lerner, 1980), a controllable world, in which people can control outcomes by engaging in proper behaviors, and a world in which events are not random. Internal subjects appeared to see the world as more good, and viewed themselves as more worthy than did externals.

These results are consistent with much of the research on locus of control and life stress, which has demonstrated a correlation between negative life stress and depression and the presence of trait-anxiety only among externals (Johnson & Sarason, 1978). Hence, it might be concluded that the effects of death of a peer can be mediated by the individual's (locus of) control over subsequent events. It may be that the externally-focused individual is less capable of

controlling reinforcement contingencies, and therefore is less likely to see justice or reason in the distribution of good and bad outcomes to people. He/she may have more difficulty making sense of the death, and may feel more threatened by the discovery of mortality as this serves to confirm his/her belief that he/she cannot be protected from death, and cannot prevent death.

While the threat of death causes fear in nearly everyone, it may be that externals are more acutely affected due to their inability to perceive death as preventable (to a degree) through the use of appropriate precautionary behaviors. External subjects may experience more intense fear and more anger for the "injustice" that has been done to them and to their friend. These feelings can lead to a reduction of trust in others due to fear , social isolation and withdrawal.

Benevolence of the world

Hypothesis thirteen, which dealt specifically with belief systems, proposed that internal subjects would report greater benevolence-of-the-world assumptions than external subjects was not confirmed. Interestingly, the experience of loss did not alter bereaved adolescents overall view of the world, in terms of implicit base-rates of good and evil. Despite their perception of lost control and injustice having been done, they maintain a belief in the benevolence of people and the impersonal world. Perhaps this finding might be attributable to the nature of death as a negative life event. Unlike may other traumatic events, bereavement does not generally involve a breach of trust or a violation of beliefs in societal goodwill. Typically, the onset of bereavement is followed by an initial surge of social support which may serve to insulated the bereaved adolescent from disruption of his/her belief in a benevolent world. In time, there is the possibility that the grieving process can be complicated by these well-meaning supporters, as they attempt to share opinions as to "appropriate" grieving (LaGrand, 1985). However, the increase in support at the point of impact may be sufficient to protect one's belief in goodwill.

Social support

Considerable past research has been aimed at testing the hypothesis that social support buffers, or ameliorates, the impact of stress on individuals. Within this body of research, debate rages on the nature, components, and measurement of social support. In spite of this confusion, however, major reviews agree that social support does indeed have significant buffering potential (Kessler & Mcleod, 1985; Sarason & Sarason, 1984). What appears to be most critical is having someone close where one can and actually does confide, along with receiving active emotional support from significant others when facing adversity (Brown & Harris, 1986). It is likely that these components derive their buffering properties from their potential to prevent the development of feelings of abandonment and helplessness, and to restore damaged feelings of self-worth.

In the present study, social support was defined as both a quantitative and qualitative construct. Subjects were asked to respond to several questions concerning the amount of support they felt they could receive from various friends, family members, and campus personnel. They were then asked to report the number of persons who would supply support in a specific situation. And finally, subjects were asked to evaluate their overall satisfaction with the support they received. Interestingly, only the satisfaction factor yielded any significant findings. Hypothesis nine, which predicted that subjects with fewer available supporters would report more grief symptoms, was disconfirmed. However, Hypothesis ten, which predicted that low satisfaction with the social support one received would be related to an increase in grief symptoms, was confirmed.

Overall, bereaved and nonbereaved adolescents reported similar numbers of available supporters. Further, within group analyses indicated no differences among the bereaved adolescents, with regard to the actual number of persons in their support network. However, when these students were asked to indicate their level of satisfaction with the support they were receiving, bereaved adolescents reported significantly less satisfaction than their nonbereaved

peers. In addition, differences emerged within this bereaved group, with those who felt less satisfied reporting more severe grief reactions. Greater satisfaction with social support appeared to correlate with decreased feelings of despair, anger,social isolation, and loss of control, as well as with less rumination, depersonalization, and somatization. These findings are consistent with the buffering hypothesis (Kessler & McLeod, 1985), in that the important component of social support is the *perception* of having someone close in whom to confide, not in the actual existence of this human resource. What is still not clear, however, is the exact nature of this relationship.

The buffering hypothesis leads one to suppose that the effect of social support is to reduce the stress response. However, it might be that the stress response itself is biasing the student's evaluation of social support. That is, in contrast to the famous description of "seeing the world through rose-colored glasses", it may be that when the bereaved adolescent is experiencing despair and anger, he/she may be more likely to be critical and dissatisfied with anything and everything in the environment. The mechanics of the interaction still remains open for exploration: Does social support actually ameliorate stress responses, or do stress responses influence the evaluation of social support?

Self-perception

Hypotheses three and five dealt specifically with the area of self-perception. Consistent with hypothesis three, bereaved subjects were found to score higher on a scale of morality than their nonbereaved peers, suggesting that bereaved adolescents feel more strongly than nonbereaved adolescents that their behavior is good and moral. This finding is consistent with the literature on sibling bereavement. Using the Offer Self-Image Questionnaire, both Balk (1983) and Hogan (1988) were able to demonstrate that bereaved adolescents score significantly higher than norm groups on a morals subscale. This finding may be due to an increased rate of maturation prompted by the experience of a life crises (Moos, 1986). Adolescence has been

conceptualized as a time when moral reasoning undergoes significant change (Thomas & Chess, 1980). This research suggests that the experience of bereavement may cause adolescents to develop moral reasoning skills more rapidly than their nonaffected peers.

Self-worth

Hypothesis five predicted that bereaved subjects would score lower on the "global self worth" scale of self perception than nonbereaved subjects; however, no such differences appeared. Interestingly, however, subjects did differ significantly on the scale of "self-worth," taken from the World Assumptions Scale. Although these two scales use similar terminology, their operational definitions provide some insight into the different self-perceptions of bereaved and nonbereaved adolescents. The Self-Perception Profile (Neeman & Harter, 1986), defines "global self-worth" as one's "general feeling about the self...liking the kind of person one is, and liking the way one is leading one's life." In contrast, the World Assumptions Scale defines "self worth" as an individual's belief that he/she is worthy of care, and that he/she takes care of him/herself by engaging in precautionary behaviors.

In this study, the bereaved individuals appear to like themselves as much as the nonbereaved individuals do. However, the bereaved adolescents appear to be more focused on protecting themselves from harm, than are the nonbereaved adolescents. One might hypothesize that this finding is due to the fact that adolescents are being threatened by the discovery of an unsafe world, where they are vulnerable to death, and where their perception of personal control is diminished by the perception that they cannot protect another from death. Bereaved adolescents may be more attuned to issues of protection and precaution as a result of their first-hand experience with loss. Further, their self-image may be marked by a feeling of isolation ("No one will understand me. And no one can protect me") which may cause them to be more self-protective (Fleming & Adolph, 1986).

Health

Two additional areas investigated by this study were the impact of the stress of peer death on personal health, and the impact of gender roles on grief reactions in adolescents. Hypotheses six and seven predicted that bereaved adolescents would report significantly more health problems than nonbereaved adolescents, and that the women in each group would report significantly more distress than the men. Neither of these hypotheses were confirmed. Given the past research demonstrating a relationship between stress and poor health in adolescents (e.g. Pennebaker & Beall, 1984), these results are surprising. One possible explanation for our lack of findings, regards the principle of "unique invulnerability," or the tendency to underestimate one's own vulnerability relative to other people's vulnerability (Perloff, 1987). Adolescents in this study were asked to report how often they experienced a variety of symptoms, including such things as acne, headaches, and constipation. It may be that these adolescents were underestimating the frequency of their experiences in order to convince themselves that they were more healthy than others.

More likely, however, is the possibility of methodological errors. The health inventory was administered to subjects at the end of a one and one-half hour session of filling in "bubble" computer sheets. It is possible that some degree of random responding occurred at this point. It is also quite likely that the particular measure was somehow unsuited for this study. Such a hypothesis is supported by the fact that the measure of physical health did not correlate with factors in which one would expect a high correlation (e.g. somatization).

Gender-roles

Hypotheses fourteen and fifteen explored the impact of gender roles with equally disappointing results. Considerable past literature on gender and coping indicates that gender role training likely influences the self-efficacy and outcome expectancies of men and women (Miller & Kirsch, 1987). Women and men tend to rely on coping responses consistent with their

gender role training, as these responses consist of well learned behaviors for which they have high self-efficacy. Situations encountered by individuals which require gender inappropriate coping responses may be stressful since the individual is likely unfamiliar with these behaviors, and thus has low self-efficacy for them.

Furthermore, past research indicates that individuals may be less likely to use gender inappropriate coping responses if they perceive they may be subject to social condemnation for doing so (Pleck, 1981). As a result of past experience, the individual may have more positive outcome expectancies for coping behaviors that are consistent with her or his gender role, than for those which violate this gender-role. This occurs as a result of different environmental contingencies for engaging in gender-appropriate behaviors (a woman crying; a man yelling) versus gender-inappropriate behaviors (a woman yelling; a man crying). Hence, it was hypothesized that as a result of gender role socialization, self-efficacy would be greater and outcome expectancies more positive for gender appropriate behaviors than for gender-inappropriate behaviors, leading to gender differences in preferred coping styles.

The results of this study did not show any effect for gender roles. no differences were observed either within the bereaved group or between the bereaved and nonbereaved groups. This counter-intuitive result may be a function of faulty measures, as the highly criticized WOC was used to assess coping. Alternatively, the lack of significant findings might be explained by the uneven distribution of subjects across the four categories of sex-roles: masculine, feminine, androgynous, and undifferentiated. In this sample, a large number of individuals were classified as undifferentiated (low on both stereotypical masculine and stereotypical feminine behaviors) and androgynous (high on both stereotypical masculine and stereotypical feminine behaviors). Hence, it was difficult to compare pure masculine and feminine groups of subjects.

The BEM is distinguished from most masculinity-femininity scales on the basis of its treatment of masculinity and femininity as two independent dimensions rather then as two ends of

a single dimension, and on its conception of the traditionally sex-typed person as someone who is highly attuned to cultural definitions of sex-appropriate behavior and who uses such definitions as the ideal standard against which his/her own behavior is evaluated (Bem, 1981). Among college students in 1992, who are largely exposed to feminist principles, it may be that these definitions of sex-appropriate behavior are less clear. For example, "competitive," "ambitious," "self-reliant," and "analytical" are all terms that one might use to describe a "good student." However, on the BEM, these terms would all be used to describe "ideal" male behaviors. "Ideal" feminine behaviors were described as more nurturing and caring. It is likely that the sample of college students used in this study were responding to a different "ideal standard" than that which is advocated by the 1981 BEM measure.

Implications for the model

One of the primary goals of this project was to provide empirical support for a developmental model of grief during adolescence. The model we presented (Fleming & Adolph, 1986) proposed that college students would experience difficulty resulting from intimacy and distance. Cognitively, the bereaved college student should be dealing with issues of trust, and the threat of lost control and safety. Behaviorally, these students are expected to be conflicted between investment and withdrawal from others. With regard to affect, these students are expected to struggle with feelings of anger, fear, rejection, alienation and emptiness. This model would predict that each of these reactions to the loss of a significant other would manifest most strongly in those who were experiencing the most intense grief reactions.

While our study did not directly assess all aspects of the model, many of our findings may be used to support it's efficiency in providing a conceptual framework for understanding how late adolescents deal with death. A primary feature of this model is the establishment of a primary conflict between intimacy and distance which is said to dominate during this particular stage of development. Given that no particular operational definitions were expounded by the developers

of the model, these constructs could not be directly assessed. However, we chose to view the construct of intimacy as a measure of interpersonal effectiveness and distance as a form of interpersonal withdrawal or disruption. Within our nonbereaved group we noted evidence of such constructs in the stressors which subjects labeled as most significant to their current functioning. Of the 52 nonbereaved individuals interviewed, over one-third identified a romantic disengagement as their primary stressor, and an additional one-third identified an inter-personal argument. Interpersonal concerns are obviously of great concern to students of this age.

Beyond the basic conflict, the model proposes several issues which manifest through cognitive, behavioral and affective means. In our sample, justice and trust were clearly shown to be as important cognitive elements in the expression of grief. When we examined beliefs in a just and benevolent world, clear differences emerged between those individuals who were challenged with the experience of loss and those who were not. Bereaved subjects appeared to have difficulty accepting the world as "fair," "safe" and "full of goodness" after they had experienced the pain caused by a seemingly pointless waste of life.

Behaviorally, the bereaved subjects in this study reported many of the "classic" manifestations of grief (e.g. rumination). However, they also reported the defining behavior of the model; namely, investment-and-withholding. Bereaved subjects reported that they would be more likely to engage in avoidance and less likely to seek social support as a way to cope with their stress than would their nonbereaved peers. Hence, we can conclude that one of their responses to the stress of peer loss was withdrawal from social contact, which supports this aspect of the model.

Affectively, our bereaved subjects reported many of the feelings predicted by the model. Among these, anger, despair, and guilt were perhaps the most prominent. We might interpret many of these findings as support for the affective component of the model. The act of reporting

disbelief in the goodness of the world, for example, might be taken as an general act of aggression intended to express some hostility toward the world, as a whole, for its injustice.

Additional support for the model stems from our data on locus of control and self-worth. In our sample, bereaved subjects who felt that they had little control over the events in their life (externals) displayed considerably more grief symptoms than those who felt a greater sense of mastery over their environment (internals). Similarly, those who reported a poor sense of self-worth, manifested significantly more grief symptoms than those who could maintain their belief in the self as worthy of care and respect.

Taken together, our findings give preliminary support to the model of late adolescent grief proposed by Fleming and Adolph (1986). Granted we have taken considerable liberties in operationalizing their proposed constructs. However, this is a first step toward integrating theory and research.

Limitations

The inadequacy of several of the measures used to evaluate subjects in this study create several limitations. Additional limitations stemmed largely from the sample. The subjects in this study, were volunteers from an Introductory Psychology class at Virginia Polytechnic and State University. Self-selection was one obvious problem. It may be that only the most, or least, distressed individuals volunteered Some students may have volunteered in order to gain extra support and to discuss difficulties, while others volunteered to demonstrate their mastery over a difficult situation. It is likely that those individuals who fell in the middle may not have been as likely to volunteer. Further, our sample was very narrowly defined (e.g. college students), and thus may not be indicative of the larger population of adolescents.

Moreover, many of the bereaved subjects in this study were responding to the same event. For example, several students belonged to the same fraternity in which a "brother" died in an automobile accident. Similarly, a large group of students living with a peer who died of cancer

all participated together. These groups of individuals had all received similar treatment from the campus counseling services and had the advantage of a group of friends who they could relate to, and share their grief.

The cross-sectional design of this study further limited the generalizability of the findings. For example, although bereaved subjects differed from their nonbereaved peers with regard to morality and assumptions about the world, it cannot be concluded that bereaved students changed their beliefs or their morals as a result of the death of a peer.

Similarly, conclusions about the impact of locus of control must be made with caution, until longitudinal data can be provided. In 1988, Sanderman (cited in Ormel & Sanderman, 1989) studied the effects of locus of control in psychological distress and the interaction effects with negative life-events in a prospective design. Interestingly, locus of control correlated significantly with the symptomatology when assessed simultaneously, but it did not predict symptomatology longitudinally. Hence, it is possible that the retrospective nature of the current study led to an overestimation of the role of locus of control in the adaptational process.

Taken together, these limitations suggest various avenues for future research, which will be discussed.

Directions for future research

Future research in the area of peer death during adolescents would benefit from more precise and appropriate measures. Our review of the literature strongly suggests that gender-role socialization should have an impact on bereavement, and on coping styles. Our findings did not demonstrate such relationships. However, we have attributed this to deficiencies in the measures we selected. Future research might attempt to explore these relationships by revising the scoring system for the "Ways of Coping" questionnaire so that a "non-applicable" option is available, and/or by using measures designed to specifically explore the interrelationship

between gender-roles and coping, such as the "Masculine Gender Role Stress" (Eisler & Skidmore, 1987) and "Feminine Gender Role Stress" (Gillespie, 1990) scales.

In addition, future studies might benefit from a larger sample size, and from tighter parameters concerning the amount and type of "counseling" received by individuals. In addition, researchers might want to explore more thoroughly the differences between sudden and anticipated bereavement in adolescents. Although our study did not demonstrate a significant effect for cause of death, this may largely be due to the homogeneity of stimuli these bereaved individuals were responding to.

Future work in the area might aim to replicate some of our findings with late adolescents, or perhaps expand upon them by fine tuning some of the constructs which we have loosely interpreted (e.g. intimacy). In addition, it will be important for researchers to conduct cross-sectional studies of bereaved adolescents at a variety of developmental stages in order to further substantiate the utility of a developmental model. Perhaps the best approach would involve longitudinal work. Longitudinal studies are greatly needed for the purpose of assessing the stability of many of the mediators of grief. Information regarding one's view of morality as well as ones related views of the world need to be examined over time to address the question of whether these views were altered by the impact of a stressor. In addition, locus of control could be examined in this way to determine whether it is associated with change in distress over time. The findings in this study could be further broken down using the methodology of Schill, Ramanaiak, and Toves (cited in Ormel & Sanderman, 1989), who identified two subgroups within the external group. These authors propose the existence of "congruent" externals, characterized by the ability to internalize this cognitive style, and "defensive" externals, characterized by the tendency to use this style as a verbal technique without internalizing the style. Perhaps differences within the external groups would shed greater light on the grieving process.

Literature Cited

Balk, D. (1983). Adolescents' grief reactions and self-concept perceptions following sibling death: A study of 33 teenagers. Journal of youth and adolescence,12, 137-161.

Balk, D.E. (1991). Death and adolescent bereavement: Current research and future directions. Journal of adolescent research,6, 7-27.

Bank, S., & Kahn, M. (1975). Sisterhood-brotherhood is powerful: sibling- subsystems in family therapy. Family Process, 14, 311-339.

Bem, S.L. (1981). Bem Sex-Role Inventory: Professional Manual. Palo Alto: Consulting Psychologists Press.

Ben-Porath, Y.S., Waller, N.G., & Butcher, J.N. (1991). Assessment of coping: An empirical illustration of the problem of inapplicable items. Journal of personality assessment, 57, 162-176.

Berardo, D.H. (1988). Bereavement and mourning. In H. Wass, F.N. Berardo, & R.A. Neimeyer (Eds.), Dying: Facing the facts (pp. 279-300). Washington, DC: Hemisphere.

Billings, A., Cronkite, R., & Moos, R. (1983). Social environmental factors in unipolar depression: Comparisons of depressed and nondepressed controls. Journal of abnormal psychology, 92, 119-133.

Brown, G.W., & Harris, T.O. (1986). Establishing causal links: The Bedford College studies of depression. In, H. Katschnig (Ed.), Life events and psychiatric disorders. Cambridge: Cambridge University Press.

Burger, J.M. (1984). Desire for control, locus of control, and proneness to depression. Journal of personality, 52, 71-89.

Cash, T.F. (1984). The irrational beliefs test: Its relationship with cognitive- behavioral traits and depression. Journal of clinical psychology, 40, 1399-1405.

Coleman, J.C., Butcher, J.N., & Carson, R.C. (1984). Abnormal psychology and modern life. Glenview, Il: Scott Foresman.

Cook, J. A. (1988). Dad's double binds: Rethinking fathers' bereavement from a men's studies perspective. Journal of contemporary ethnography, 17 , 285-308.

Cotton, C.R., & Range, L.M. (1990). Children's death concepts: Relationship to cognitive functioning, age, experience with death, fear of death, and helplessness. Journal of clinical child psychology, 19. 123-127.

Coyne, J.C., Aldwin, C., & Lazarus, R.S. (1981). Depression and coping with stressful episodes. Journal of abnormal psychology, 90, 439-447.

Curran, D.K. (1987) Adolescent suicidal behavior. Washington, DC: Hemisphere.

Davies, B. (1991). Long-term outcomes of adolescent sibling bereavement. Journal of adolescent research,6, 83-96.

DiClemente, R.J. (1990) The emergence of adolescents as a risk group for human immunodeficiency virus infection. Journal of adolescent Research, 5, 7-17.

Eisler, R.M., & Skidmore, J.R. (1987). Masculine gender role stress: Scale development and component factors in the appraisal of stressful situations. Behavior Modification, 11, 123 - 136.

Fanos, J.H., & Nickerson, B.G. (1991). Long-term effects of sibling death during adolescence. Journal of adolescent research, 6, 70-82.

Fiefel, H., Ed. (1959). The meaning of death. New York: McGraw-Hill Book Co.

Fleming, S.J., & Adolph, R. (1986). Helping bereaved adolescents: Needs and responses. In C.A. Corr & J. N. McNeil (Eds.). Adolescence and death. New York: Springer.

Floerchinger,D.S. (1991). Bereavement in late adolescence: Interventions on college campuses. Journal of adolescent research, 6, 146-156.

Folkman, S., & Lazarus, R.S. (1980). An analysis of coping in a middle-aged community sample. Journal of health and social behavior, 21 , 219-239.

Folkman, S., & Lazarus, R.S. (1985). If it changes it must be a process: Study of emotion and coping during three stages of a college examination. Journal of personality and social psychology, 48, 150-159.

Folkman, S., & Lazarus, R.S. (1988). Manual for the ways of coping questionnaire. Palo Alto: Consulting Psychologists Press.

Freese, A. (1977). Help for your grief. New York: Jossey-Bass.

Garber, B. (1985). Mourning in adolescence: Normal and pathological. Adolescent psychiatry, 12, 371-387.

Gillespie, B.L. (1990). the feminine gender role stress scale: Development, factor analysis, and preliminary validation. Unpublished master's thesis. Virginia Polytechnic Institute and State University.

Gyulay, J. (1975). The forgotten grievers. American journal of nursing, 75, 1476- 1479.

Hendin, D. (1984). Death as a fact of life. New York: W.W. Norton & Company.

Heikkinen, C.A. (1979). Counseling for personal loss. Personnel and guidance journal, 58, 46-49.

Hogan, N.S. (1988). The effects of time on the adolescent sibling bereavement process. Pediatric nursing,14, 333-335.

Hogan, N.S., & Balk, D.E. (1990). Adolescent reactions to sibling death: Perceptions of mothers, fathers, and teenagers. Nursing research,39, 103-106.

Hogan, N.S., & Greenfield, D.B. (1991). Adolescent sibling bereavement symptomatology in a large community sample. Journal of adolescent research, 6, 97-112.

Janoff-Bulman, R., (1989). Assumptive worlds and the stress of traumatic events: Application of the schema construct. Social Cognition, 7, 113-136.

Janoff-Bulman, R., & Frieze, I.H. (1983). A theoretical perspective for understanding reactions to victimization. Journal of social issues, 39, 1-17.

Johnson, J.H., & Sarason, I.G. (1978). Life stress, depression and anxiety: Internal-external control as a moderator variable. Journal of psychosomatic research, 27, 205-208.

Kastenbaum, R., & Aisenberg, R. (1972). The psychology of death. New York: Springer.

Kessler, R.C., & McLeod, J. (1985). Social support and psychological distress in community surveys. In S. Cohen & S.L. Syme (Eds.), Social support and health. New York: Academic Press.

Knott, J.E., & Crafts, R. (1980). The realities of college student death. NASPA Journal,18, 29-34.

Koocher, G. (1973). Childhood, death, and cognitive development. Developmental psychology,9, 369-375.

Kubler-Ross, E. (1969). On death and dying. New York: Macmillan.

LaGrand, L.E. (1985). College student loss and response. In Ellen S. Zinner (Ed.), Coping with death on campus, p. 15-29, San Francisco:Jossey-Bass Inc.

La Greca, A.L. (1988). Suicide: Prevalence, theories, and prevention. In H. Wass, F.N. Berardo, & R.A. Neimeyer (Eds.), Dying: Facing the facts (pp. 229-255). Washington, DC: Hemisphere.

LaTour, K. (1983). For those who live: Helping children cope with the death of a brother or sister. Centering Corporation: Omaha.

Lazarus, R.S., & Folkman, S. (1984). Stress, appraisal, and coping. New York: Springer.

Lerner, M.J. (1980). The belief in a just world. New York: Plenum.

McNeil, J.N., Silliman, B., & Swihart, J.J. (1991). Helping adolescents cope with the death of a peer: A high school case study. Journal of adolescent research, 6, 132-145.

Milgram, N.A. (1989). Children under stress. In T.H. Ollendick & M. Hersen (Eds.), Handbook of child psychopathology: Second Edition (pp. 399-419). New York: Plenum Press.

Miller, S.M. & Kirsch, N. (1987). Sex differences in cognitive coping with stress. In K.C. Barnett, L. Biener, & G. Baruch (Eds.) Gender and stress. New York: The Free Press.

Moos, R.H. (Ed.). (1986). Coping with life crises: An integrated approach. New York: Plenum.

Nagy, M.H. (1948). The child's theories concerning death. Journal of genetic psychology, 73, 3-27.

Neemann, J., & Harter, S. (1986). Manual for the self-perception profile for college students. Denver: University of Denver.

Noppe, L.D., Noppe, I.C. (1991). Dialectical themes in adolescent conceptions of death. Journal of adolescent research, 6, 28-42.

Oltjenbruns, K.A. (1991). Positive outcomes of adolescents' experience with grief. Journal of adolescent research,6, 43-53.

Ormel, J., & Sanderman, R. (1989). Life events, personal control and depression. In A. Steptoe & A. Appels (Eds.) Stress, personal control and health. Chichester: John Wiley & Sons.

Parkes, C.M., & Brown, R.J. (1972). Health after bereavement: A controlled study of young Boston widows and widowers. Psychosomatic medicine, 34, 449-461.

Pennebaker, J.W. (1982). The psychology of physical symptoms. New York: Springer-Verlag.

Pennebaker, J.W., & Beall, S.K. (1986). Confronting a treaumatic event: Toward an understanding of inhibition and disease. Journal of abnormal psychology, 95, 274-281.

Perloff, R. (1987). Self-interest and personal responsibility redux. American psychologist, 42, 3-11.

Pfost,K., Stevens, M., & Wessels, A. (1989). Relationship of purpose in life to grief experiences in response to the death of a significant other. Death studies,13, 371-378.

Phares, E.J. (1976). Locus of control in personality. Morristown: Silver Burdett Company.

Pleck, J.H. (1981). The myth of masculinity. Cambridge, MA: MIT Press.

Rando, T.A. (1988). Grieving: How to go on living when someone you love dies. Lexington, MA: Lexington Books.

Raphael, B. (1983). The anatomy of bereavement. New York: Basic Books.

Sanders, C. M., (1979). A comparison of adult bereavement in the death of a spouse, child, and parent. Omega, 10, 303-322.

Sanders, C.M., Mauger, P.A., & Strong, P.N. (1977). A manual for the grief experience inventory.

Sarason, I.G., & Levine, H.M. (1983). Assessing social support: The Social Support Questionnaire. Journal of personality and social psychology, 44, 127-139.

Sarason, I.G. and Sarason, B.R. (Eds.) (1984). Social Support: Theory, research and applications. Dordrecht: Matinus Nijhoff.

Schwartzberg, S.S., & Janoff-Bulman, R. (1991). Grief and the search for meaning: Exploring the assumptive worlds of bereaved college students. Journal of social and clinical psychology, 10, 270-288.

Siegel, L.J., & Griffin, N.J. (1984). Correlates of depressive symptoms in adolescents. Journal of youth and adolescence, 13, 475-487.

Sklar, F., & Hartley, S.F. (1990). Close friends as survivors: Bereavement patterns in a "hidden" population. Omega, 21, 103-112.

Spiegel, Y. (1977). The grief process: Analysis and counseling. Nashville: Abingdon.

Spinetta, J.J. (1978). The dying child's awareness of death: A review. Psychological bulletin, 81, 751-756.

Stevens, M.J., Pfost, K.S., & Wessels, A.B. (1987). The relationship of purpose in life to coping strategies and time since the death of a significant other. Journal of counseling and development, 65, 424-426.

Taylor, S.E., & Brown, J.D. (1988). Illusion and well-being: A social psychological perspective on mental health. Psychological bulletin, 103, 193-210.

Thomas, A., & Chess, S. (1980). The dynamics of psychological development. New York: Brunner /Mazel.

Waller, N.G. (1989). The effect of inapplicable item responses on the structure of behavioral checklist data: A cautionary note. Multivariate behavioral research, 24, 125-134.

Worden, J.W. (1981). Grief counseling and grief therapy. New York: Springer.

Yalom, I. (1980). Existential psychotherapy. New York: Basic Books.

Zeltzer,L. (1980). The adolescent with cancer. In J. Kellerman (Ed.). Psychological aspects of childhood cancer. Springfield, IL: Charles C. Thomas.

Zinner, E.S. (1987). Responding to suicide in schools: A case study in loss intervention and group survivorship. Journal of counseling and development,65, 499-501.

Appendix A

Introduction to Psychology Sign-Up for Bereaved Group

Primary Investigator: Kerri A. Weise

Faculty Sponsor: Dr. Russell Jones

When someone you care about dies, your life can be forever altered by this loss. The grief process is often long, and unpredictable. No two people can be expected to react in exactly the same way.

The purpose of this study is to investigate the ways in which the experience of bereavement can effect college students, over time. Specifically, we are interested in STUDENTS WHO HAVE EXPERIENCED THE SUDDEN DEATH OF A FRIEND DURING THE PAST 3 YEARS.

Participation will involve the completion of several questionnaires which ask about changes in your behavior, attitudes, and feelings since your loss. It is expected to take 1 to 1-1/2 hours to complete all questionnaires. If you are an Introductory Psychology student, you will be given 1 to 2 credits for your participation. If you are not, you will be paid a small cash stipend for your participation.

If you are interested in participating in this study, please complete one of the attached slips, and put it in the envelope on the door of Derring 4098. You will be contacted shortly thereafter.

Your confidentiality is guaranteed, and your interest is deeply appreciated.

For Further Information, contact
Kerri A. Weise
(703) 552-4122

Introductory Psychology Sign-Up for Non-Bereaved Group

Primary Investigator: Kerri A. Weise
Faculty Sponsor: Dr. Russell Jones

When someone you care about dies, your life can be forever altered by this loss. The grief process is often long, and unpredictable. No two people can be expected to react in exactly the same way. The purpose of this study is to investigate the ways in which the experience of bereavement over the loss of a friend can effect college students, over time. In order for us to make conclusions about the effects of loss, we need to also look at people who have not experienced any recent losses.

Specifically, we are looking for people who have NOT experienced any significant losses during the past 3 years.

Participation will involve the completion of several questionnaires which ask about changes in your behavior, attitudes, and feelings. It is expected to take 1 to 1-1/2 hours to complete all questionnaires. If you are an Introductory Psychology student, you will be given 1 to 2 credits for your participation.

If you are interested in participating in this study, please complete one of the attached slips, and put it in the envelope on the door of Derring 4098. You will be contacted shortly thereafter.

Your confidentiality is guaranteed, and your interest is deeply appreciated.

For Further Information, contact
Kerri A. Weise
(703) 552-4122

Appendix B

Measures

Information Sheet

1. Age: _____

2. Sex: _____ Male _____ Female

3. Race: _____ Caucasian _____ Black _____ Asian _____ Other,

_____

IF YOU HAVE **NOT** EXPERIENCED THE LOSS OF A PEER IN THE PAST 3 YEARS, PLEASE CHECK HERE _____ AND SKIP TO **QUESTION #11**.

4. My friend was...

_____ Male _____ Female

5. My friend was...

_____ Years old when he/she died

6. The cause of my friend's death was:

_____ Homicide

_____ Suicide

_____ Automobile Accident

_____ Long-term illness, ----------

-------- Other, ----------

7. Number Of Months Since Your Loss: _____

8. Have your received any counseling for this loss? Check all that apply.

_____ None

_____ Religious

_____ Psychological

_____ Medical

_____ Other, _____

9. How close were you to this person? (circle a number)

1	2	3	4	5	6	7
Not at all close			Close			Extremely Close

10. How much "emotional trauma" did this loss cause for you?

1	2	3	4	5	6	7
None all close			Some		Extreme	

11. In the last 4 weeks, have you thought about committing suicide? or wished to die?

Yes **No**

==========

==========If "yes", continue. If "no", go to the next page.

==========

12. Over the past 2 weeks, how strong has your desire been to make an active suicide attempt?

0. None
1. Weak
2. Moderate to strong

13. Can you think of anything that would keep you from killing yourself? (Your religion, consequences for your family, chance that you may injure yourself seriously if unsuccessful)

0. Would not attempt suicide because of a deterrent
1. I can name a deterrent, but it does not definitely rule out suicide
2. I have little or no concern about these things

14. How much control do you think you have over acting on these suicidal ideas?

0. I have control
1. I am not sure whether I have control
2. I have no control

Ways of Coping Questionnaire

Instructions: To respond to the statements in this questionnaire, you must have a specific stressful situation in mind. If you have lost a peer in the last three years, please use this as your referent event. If you have not, please take a few moments and think about the most stressful situation that you have experienced in the past three years.

By "stressful" we mean a situation that was difficult or troubling for you, either because you felt distressed about what happened, or because you had to use considerable effort to deal with the situation. The situation may have involved your family, your job, your friends, or something else important to you. Before responding to the statements, think about the details of this stressful event, such as where it happened, who was involved, how you acted, and why it was important to you. While you may still be involved in the situation, or it could have already happened, it should be the **most stressful** situation you have recently experienced.

Please write a brief statement to describe the situation you have chosen:

As you respond to each of the statements, please keep this situation in mind. Read each statement carefully and indicate by filling in the appropriate circle on the opscan, to what extent you used it in the situation. Please respond to every item.

0 - Never used
1 - Used somewhat
2 - Used quite a bit
3 - Used a great deal

1. I just concentrated on what I had to do next --- the next step.
2. I tried to analyze the problem in order to understand it better.
3. I turned to work or another activity to take my mind off things.
4. I felt that time would make a difference -- the only thing was to wait.
5. I bargained or compromised to get something positive from the situation.

6. I did something that I didn't think would work, but at least I was doing something.
7. I tried to get the person responsible to change his or her mind.
8. I talked to someone to find out more about the situation.
9. I criticized or lectured myself.
10. I tried not to burn my bridges, but leave things open somewhat.

11. I hoped for a miracle.
12. I went along with fate; sometimes I just have bad luck.
13. I went on as if nothing had happened.
14. I tried to keep my feelings to myself.
15. I looked for the silver lining, so to speak. I tried to look on the bright side of things.

16. I slept more than usual.
17. I expressed anger to the person(s) who caused the problem.
18. I accepted sympathy and understanding from someone.
19. I told myself things that helped me feel better.
20. I was inspired to do something creative about the problem.

21. I tried to forget the whole thing.
22. I got professional help.
23. I changed or grew as a person.
24. I waited to see what would happen before doing anything.
25. I apologized or did something to make up.

26. I made a plan of action and followed it.

27. I accepted the next best thing to what I wanted.
28. I let my feelings out somehow.
29. I realized that I had brought the problem on myself.
30. I came out of the experience better than when I went in.

31. I talked to someone who could do something concrete about the problem.
32. I tried to get away from it for a while by resting or taking a vacation.
33. I tried to make myself feel better by eating, drinking, smoking, using drugs, or medications etc.
34. I took a big chance or did something very risky to solve the problem.
35. I tried not to act too hastily or follow my first hunch.

36. I found new faith.
37. I maintained my pride and kept a stiff upper lip.
38. I rediscovered what is important in life.
39. I changed something so things would turn out all right.
40. I generally avoided being with people.

41. I didn't let it get to me; I refused to think too much about it.
42. I asked advice from a relative or friend I respected.
43. I kept others from knowing how bad things were.
44. I made light of the situation; I refused to get too serious about it.\
45. I talked to someone about how I was feeling.

46. I stood my ground and fought for what I wanted.
47. I took it out on other people.
48. I drew on my past experiences; I was in a similar situation before.
49. I knew what had to be done, so I doubled my efforts to make things work.
50. I refused to believe that it had happened.

51. I promised myself that things would be different next time.
52. I came up with a couple of different solutions to the problem.
53. I accepted the situaion, since nothing could be done.
54. I tried to keep my feelings about the problem from interfering with other things.
55. I wished that I could change what had happened or how I felt.

56. I changed something about myself.
57. I daydreamed or imagined a better time or place than the one I was in.
58. I wished that the situation would go away or somehow be over with.
59. I had fantasies or wishes about how things might turn out.
60. I prayed.

61. I prepared myself for the worst.
62. I went over in my mind what I would say or do.
63. I thought about how a person I admire would handle this situation and used that as a model.
64. I tried to see things from the other person's point of view.
65. I reminded myself how much worse things could be.

66. I jogged or exercised.

WHAT I AM LIKE

Age_____ Subject Number_____
Male___ Female___ Name_____

The following are statements which allow college students to describe themselves. There are no right or wrong answers since students differ markedly. Please read the entire sentence across. First decide which one of the two parts of each statement best describes you; then go to that side of the statement and check whether that is just sort of true for you or really true for you. You will just check ONE of the four boxes for each statement. Think about what you are like in the college environment as you read and answer each one.

REALLY TRUE FOR ME	SORT OF TRUE FOR ME			SORT OF TRUE FOR ME	REALLY TRUE FOR ME
1. ☐	☐	Some students like the kind of person they are	BUT	Other students wish that they were different.	☐	☐
2. ☐	☐	Some students are not very proud of the work they do on their job	BUT	Other students are very proud of the work they do on their job.	☐	☐
3. ☐	☐	Some students feel confident that they are mastering their coursework	BUT	Other students do not feel so confident.	☐	☐
4 .☐	☐	Some students are not satisfied with their social skills	BUT	Other students think their social skills are just fine.	☐	☐
5. ☐	☐	Some students are not happy with the way they look	BUT	Other students are happy with the way they look.	☐	☐
6. ☐	☐	Some students like the way they act when they are around their parents	BUT	Other students wish they acted differently around their parents.	☐	☐

	REALLY TRUE FOR ME	SORT OF TRUE FOR ME			SORT OF TRUE FOR ME	REALLY TRUE FOR ME
7.	☐	☐	Some students get kind of lonely because they don't really have a close friend to share things with	BUT	Other students don't usually get too lonely because they do have a close friend to share things with.	☐ ☐
8.	☐	☐	Some students feel like they are just as smart or smarter than other students	BUT	Other students wonder if they are as smart.	☐ ☐
9.	☐	☐	Some students often question the morality of their behavior	BUT	Other students feel their behavior is usually moral.	☐ ☐
10.	☐	☐	Some students feel that people they like romantically will be attracted to them	BUT	Other students worry about whether people they like romantically will be attracted to them.	☐ ☐
11.	☐	☐	When some students do something sort of stupid that later appears very funny, they find it hard to laugh at themselves	BUT	When other students do something sort of stupid that later appears very funny, they can easily laugh at themselves.	☐ ☐
12.	☐	☐	Some students feel they are just as creative or even more so than other students	BUT	Other students wonder if they are as creative.	☐ ☐
13.	☐	☐	Some students feel they could do well at just about any new athletic activity they haven't tried before	BUT	Other students are afraid they might not do well at athletic activities they haven't ever tried.	☐ ☐
14.	☐	☐	Some students are often disappointed with themselves	BUT	Other students are usually quite pleased with themselves.	☐ ☐

	REALLY TRUE FOR ME	SORT OF TRUE FOR ME			SORT OF TRUE FOR ME	REALLY TRUE FOR ME
15.	☐	☐	Some students feel they are very good at their job	BUT	Other students worry about whether they can do their job.	☐ ☐
16.	☐	☐	Some students do very well at their studies	BUT	Other students don't do very well at their studies.	☐ ☐
17.	☐	☐	Some students find it hard to make new friends	BUT	Other students are able to make new friends easily.	☐ ☐
18.	☐	☐	Some students are happy with their height and weight	BUT	Other students wish their height or weight was different.	☐ ☐
19.	☐	☐	Some students find it hard to act naturally when they are around their parents	BUT	Other students find it easy to act naturally around their parents.	☐ ☐
20.	☐	☐	Some students are able to make close friends they can really trust	BUT	Other students find it hard to make close friends they can really trust.	☐ ☐
21.	☐	☐	Some students do not feel they are very mentally able	BUT	Other students feel that they are very mentally able.	☐ ☐
22.	☐	☐	Some students usually do what is morally right	BUT	Other students sometimes don't do what they know is morally right.	☐ ☐
23.	☐	☐	Some students find it hard to establish romantic relationships	BUT	Other students don't have difficulty establishing romantic relationships.	☐ ☐

	REALLY TRUE FOR ME	SORT OF TRUE FOR ME			SORT OF TRUE FOR ME	REALLY TRUE FOR ME
24.	☐	☐	Some students don't mind being kidded by their friends	BUT	Other students are bothered when friends kid them.	☐	☐
25.	☐	☐	Some students worry that they are not as creative or inventive as other people	BUT	Other students feel they are very creative and inventive.	☐	☐
26.	☐	☐	Some students don't feel they are very athletic	BUT	Other students do feel they are athletic.	☐	☐
27.	☐	☐	Some students usually like themselves as a person	BUT	Other students often don't like themselves as a person.	☐	☐
28.	☐	☐	Some students feel confident about their ability to do a new job	BUT	Other students worry about whether they can do a new job they haven't tried before.	☐	☐
29.	☐	☐	Some students have trouble figuring out homework assignments	BUT	Other students rarely have trouble with their homework assignments.	☐	☐
30.	☐	☐	Some students like the way they interact with other people	BUT	Other students wish their interactions with other people were different.	☐	☐
31.	☐	☐	Some students wish their body was different	BUT	Other students like their body the way it is.	☐	☐
32.	☐	☐	Some students feel comfortable being themselves around their parents	BUT	Other students have difficulty being themselves around their parents.	☐	☐

	REALLY TRUE FOR ME	SORT OF TRUE FOR ME			SORT OF TRUE FOR ME	REALLY TRUE FOR ME
33.	☐	☐	Some students don't have a close friend they can share their personal thoughts and feelings with	BUT	Other students do have a friend who is close enough for them to share thoughts that are really personal.	☐ ☐
34.	☐	☐	Some students feel they are just as bright or brighter than most people	BUT	Other students wonder if they are as bright.	☐ ☐
35.	☐	☐	Some students would like to be a better person morally	BUT	Other students think they are quite moral.	☐ ☐
36.	☐	☐	Some students have the ability to develop romantic relationships	BUT	Other students do not find it easy to develop romantic relationships.	☐ ☐
37.	☐	☐	Some students have a hard time laughing at the ridiculous or silly things they do	BUT	Other students find it easy to laugh at themselves.	☐ ☐
38.	☐	☐	Some students do not feel that they are very inventive	BUT	Other students feel that they are very inventive.	☐ ☐
39.	☐	☐	Some students feel they are better than others at sports	BUT	Other students don't feel they can play as well.	☐ ☐
40.	☐	☐	Some students really like the way they are leading their lives	BUT	Other students often don't like the way they are leading their lives.	☐ ☐

	REALLY TRUE FOR ME	SORT OF TRUE FOR ME			SORT OF TRUE FOR ME	REALLY TRUE FOR ME
41.	☐	☐	Some students are not satisfied with the way they do their job	BUT	Other students are quite satisfied with the way they do their job	☐	☐
42.	☐	☐	Some students sometimes do not feel intellectually competent at their studies	BUT	Other students usually do feel intellectually competent at their studies.	☐	☐
43.	☐	☐	Some students feel that they are socially accepted by many people	BUT	Other students wish more people accepted them.	☐	☐
44.	☐	☐	Some students like their physical appearance the way it is	BUT	Other students do not like their physical appearance.	☐	☐
45.	☐	☐	Some students find that they are unable to get along with their parents	BUT	Other students get along with their parents quite well.	☐	☐
46.	☐	☐	Some students are able to make really close friends	BUT	Other students find it hard to make really close friends.	☐	☐
47.	☐	☐	Some students would really rather be different	BUT	Other students are very happy being the way they are.	☐	☐
48.	☐	☐	Some students question whether they are very intelligent	BUT	Other students feel they are intelligent.	☐	☐

	REALLY TRUE FOR ME	SORT OF TRUE FOR ME			SORT OF TRUE FOR ME	REALLY TRUE FOR ME
49.	☐	☐	Some students live up to their own moral standards	BUT	Other students have trouble living up to their moral standards.	☐	☐
50.	☐	☐	Some students worry that when they like someone romantically, that person won't like like them back	BUT	Other students feel that when they are romantically interested in someone, that person will like them back.	☐	☐
51.	☐	☐	Some students can really laugh at certain things they do	BUT	Other students have a hard time laughing at themselves.	☐	☐
52.	☐	☐	Some students feel they have a lot of original ideas	BUT	Other students question whether their ideas are very original.	☐	☐
53.	☐	☐	Some students don't do well at activities requiring physical skill	BUT	Other students are good at activities requiring physical skill.	☐	☐
54.	☐	☐	Some students are often dissatisfied with themselves	BUT	Other students are usually satisfied with themselves.	☐	☐

World Assumptions Scale

Please use the scale that follows in responding to the statements below. Please answer honestly; we are interested in your true beliefs.

1 = strongly disagree
2 = moderately disagree
3 = slightly disagree
4 = slightly agree
5 = moderately agree
6 = strongly agree

To what extent do you disagree/agree with each of the following statements?

1. Misfortune is least likely to strike worthy, decent people.
2. People are naturally unfriendly and unkind.
3. Bad events are distributed to people at random.
4. Human nature is basically good.
5. The good things that happen in this world far outnumber the bad.
6. The course of our lives is largely determined by chance.
7. Generally, people deserve what they get in this world.
8. I often think I am no good at all.
9. There is more good than evil in the world.
10. I am basically a lucky person.
11. People's misfortunes result from mistakes they have made.
12. People don't really care what happens to the next person.
13. I usually behave in ways that are likely to maximize good results for me.
14. People will experience good fortune if they themselves are good.
15. Life is too full of uncertainties that are determined by chance.
16. When I think about it, I consider myself very lucky.
17. I almost always make an effort to prevent bad things from happening to me.
18. I have a low opinion of myself.
19. By and large, good people get what they deserve in this world.
20. Through our actions we can prevent bad things from happening to us.
21. Looking at my life, I realize that chance events have worked out well for me.
22. If people took preventive actions, most misfortune could be avoided.
23. I take the actions necessary to protect myself against misfortune.
24. In general, life is mostly a gamble.
25. The world is a good place.
26. People are basically kind and helpful.

27. I usually behave so as to bring about the greatest good for me.
28. I am very satisfied with the kind of person I am.
29. When bad things happen, it is typically because people have not taken the necessary actions to protect themselves.
30. If you look closely enough, you will see that the world is full of goodness.
31. I have reason to be ashamed of my personal character.
32. I am luckier than most people.

Pennebaker Inventory of Limbic Languidness

Several common symptoms or bodily sensations are listed on the following pages. Most people have experienced most of them at one time or another. We are currently interested in finding out how prevalent each symptom is among college students. All data will be confidential.

Indicate on your opscan the number that corresponds to the symptoms below which indicates how frequently you experience that symptom. Use the following scale for all items.

1 = have never or almost never experienced the symptom
2 = less than 3 or 4 times per year
3 = every month or so
4 = every week or so
5 = more than once every week

==========

1. eyes water

2. itching or painful eyes
3. ringing in your ears
4. temporary deafness or hard of hearing
5. lump in throat

6. choking sensations
7. sneezing spells
8. running nose
9. congested nose
10. bleeding nose

11. asthma or wheezing
12. coughing
13. out of breath
14. swollen ankles
15. chest pains

16. racing heart
17. cold hands or feet even in hot weather
18. leg cramps
19. insomnia
20. toothaches

21. upset stomach
22. indigestion
23. heartburn
24. severe pains or cramps in stomach
25. diarrhea

26. constipation

27. hemorrhoids
28. swollen joints
29. stiff muscles
30. back pains

31. sensitive or tender skin
32. face flushes
33. severe itching
34. skin breaks out in rash
35. acne or pimples on face

36. acne or pimples other than face
37. boils
38. sweat even in cold weather
39. strong reactions to insect bites
40. headaches

41. sensation of pressure in head
42. hot flashes
43. chills
44. dizziness
45. feel faint

46. numbness or tingling in any part of body
47. twitching of eyelid
48. twitching other than eyelid
49. hands tremble or shake
50. stiff joints

51. sore muscles
52. sore throat
53. sunburn
54. nausea

Social Support Questionnaire

Instructions: The following questions ask about people in your environment who provide you with help or support. Each question has two parts. For the first part, list all the people you know, excluding yourself, whom you can count on for help or support in the manner described. Give the persons' initials, their relationship to you (see example). Do not list more than one person next to each of the numbers beneath each question.

For the second part, circle how satisfied you are with the overall support you have.

If you have had no support for a question, check the words "NO ONE," but still rate your level of satisfaction. Do not list more than nine persons per question.

Please answer all the questions as best you can. All your responses will be kept confidential.

Example:

Who do you know whom you can trust with information that could get you in trouble?

--- No one. 1) T.N. (brother) 4) T.N. (father)
2) L.M. (friend) 5) L.M. (employer)
3) R.S. (friend) 6)

How satisfied?

6- very satisfied	5- fairly satisfied	4- a little satisfied	3-a little dissatisfied	2-fairly dissatisfied	1-very dissatisfied

==========

1. Whom can you really count on to be dependable when you need help?

___ No one.	1)	4)	7)
	2)	5)	8)
	3)	6)	9)

2. How satisfied?

6- very satisfied	5- fairly satisfied	4- a little satisfied	3-a little dissatisfied	2-fairly dissatisfied	1-very dissatisfied

3. Whom can you really count on to help you feel more relaxed when you are under pressure or tense?

___ No one.	1)	4)	7)
	2)	5)	8)
	3)	6)	9)

4. How satisfied?

6- very satisfied	5- fairly satisfied	4- a little satisfied	3-a little dissatisfied	2-fairly dissatisfied	1-very dissatisfied

5. Who accepts you totally, including both your worst and your best points?

____	No one.	1)	4)	7)
		2)	5)	8)
		3)	6)	9)

6. How satisfied?

6- very satisfied	5- fairly satisfied	4- a little satisfied	3-a little dissatisfied	2-fairly dissatisfied	1-very dissatisfied

7. Whom can your really count on to care about your, regardless of what is happening to you?

____	No one.	1)	4)	7)
		2)	5)	8)
		3)	6)	9)

8. How satisfied?

6- very satisfied	5- fairly satisfied	4- a little satisfied	3-a little dissatisfied	2-fairly dissatisfied	1-very dissatisfied

9. Whom can you really count on to help you feel better when you are feeling generally down in the dumps?

____	No one.	1)	4)	7)
		2)	5)	8)
		3)	6)	9)

10. How satisfied?

6- very satisfied	5- fairly satisfied	4- a little satisfied	3-a little dissatisfied	2-fairly dissatisfied	1-very dissatisfied

11. Whom can you count on to console you when you are very upset?

____	No one.	1)	4)	7)
		2)	5)	8)
		3)	6)	9)

12. How satisfied?

6- very satisfied	**5**- fairly satisfied	**4**- a little satisfied	**3**-a little dissatisfied	**2**-fairly dissatisfied	**1**-very dissatisfied

Rotter's Locus of Control

LOC Scale

Directions : Read both statements carefully. Select the statement that you agree with most (a or b). Enter "1" if you agree most with statement "a". Enter "2" if you agree most with statement "b". Enter only one answer for each question.

1. a. Children get into trouble because their parents punish them too much.
   b. The trouble with most children nowadays is that their parents are too easy with them.

2. a. Many of the unhappy things in people's lives are partly due to bad luck.
   b. People's misfortunes result from the mistakes they make.

3. a. One of the major reasons why we have wars is because people don't take enough interest in politics.
   b. There will always be wars, no matter how hard people try to prevent them.

4. a. In the long run, people get the respect they deserve in this world.
   b. Unfortunately, an individual's worth often passes unrecognized no matter how hard he tries.

5. a. The idea that teachers are unfair to students is nonsense.
   b. Most students don't realize the extent to which their grades are influenced by accidental happenings.

6. a. Without the right breaks one cannot be an effective leader.
   b. Capable people who fail to become leaders have not taken advantage of their opportunities.

7. a. No matter how hard you try some people just don't like you.
   b. People who can't get others to like them don't understand how to get along with others.

8. a. Heredity plays the major role in determining one's personality
   b. People who can't get others to like them don't understand how to get along with others.

9. a. I have often found that what is going to happen will happen.
   b. Trusting to fate has never turned out as well for me as making a decision to take a definite course of action.

10. a. In the case of the well prepared student, there is rarely if ever such a thing as an unfair test.
    b. Many times exam questions tend to be so unrelated to course work that studying is really useless

11. a. Becoming a success is a matter of hard work, luck has little or nothing to do with it.
    b. Getting a good job depends mainly on being in the right place at the right time.

12. a. The average citizen can have an influence in government decisions.
    b. This world is run by the few people in power, and there is not much the little guy can do about it.

13. a. When I make plans, I am almost certain that I can make them work.
    b. It is not always wise to plan too far ahead because many things turn out to be a matter of good or bad fortune anyway.

14. a. There are certain people who are just no good.
    b. There is some good in everybody.

15. a. In my case getting what I want has little or nothing to do with luck.
    b. Many times we might just as well decide what to do by flipping a coin.

16. a. Who gets to be the boss often depends on who was lucky enough to be in the right place first.
    b. Getting people to do the right thing depends upon ability; luck has little to do with it.

17. a. As far as world affairs are concerned, most of us are the victims of forces we can neither understand nor control.
    b. By taking an active part in political and social affairs, the people can control world events.

18. a. Most people don't realize the extent to which their lives are controlled by accidental happenings.
    b. There really is no such thing as "luck"

19. a. One should always be willing to admit mistakes.
    b. It is usually best to cover up one's mistakes.

20. a. It is hard to know whether or not a person really likes you.
    b. How many friends you have depends upon how nice a person you are.

21. a. In the long run the bad things that happen to us are balanced by the good ones.
    b. Most misfortunes are the result of lack of ability, ignorance, laziness, or all three.

22. a. With enough effort we can wipe out political corruption.
    b. It is difficult for people to have much control over the things politicians do once they are in office.

23. a. Sometimes I can't understand how teachers arrive at the grades they give.
    b. There is a direct connection between how hard I study and the grades I get.

24. a. A good leader expects people to decide for themselves what they should do.
    b. A good leader makes it clear to everybody what their jobs are

25. a. Many times I feel that I have little influence over the things that happen to me.
    b. It is impossible for me to believe that chance or luck plays an important role in my life.

26. a. People are lonely because they don't try to be friendly.
    b. There's not much use in trying too hard to please people, if they like you, they like you.

27. a. There is too much emphasis on athletics in high school.
    b. Team sports are an excellent way to build character.

28. a. What happens to me is my own doing.
    b. Sometimes I feel that I don't have enough control over the direction my life is taking.

29. a. Most of the time I can't understand why politicians behave the way they do.
    b. In the long run, the people are responsible for bad government on a national as well as on a local level.

GRIEF EXPERIENCE INVENTORY

Catherine M. Sanders, Paul A. Mauger,
and Paschal N. Strong, Jr.

1. Immediately after the death, I felt exhausted.
2. I tend to be more irritable with others.
3. I am strongly preoccupied with the image of the deceased.
4. I frequently experience angry feelings.
5. It is not difficult to maintain social relationships with friends.
6. My arms and legs feel very heavy.
7. I am unusually aware of things related to death.
8. It seems to me that more could have been done for the deceased.
9. I showed little emotion at the funeral.
10. I felt a strong necessity for maintaining the morale of others after the death.
11. I feel cut off and isolated.
12. I rarely take aspirins.
13. I feel reluctant to attend social gatherings.
14. I was unable to cry at the announcement of the death.
15. I have feelings of guilt because I was spared and the deceased was taken.
16. I have a special need to be near others.
17. I often experience confusion.
18. I feel lost and helpless.
19. I am comforted by believing that the deceased is in heaven.
20. I have had frequent headaches since the death.
21. It was difficult to part with the clothing and personal articles of the deceased.
22. It was necessary to take sleeping pills after the death.
23. The yearning for the deceased is so intense that I sometimes feel physical pain in my chest.
24. I cry easily.
25. I have taken tranquilizers since the death.
26. I experience a dryness of the mouth and throat.
27. I feel restless.
28. Upon first learning of the death, I had a dazed feeling.
29. Concentrating upon things is difficult.
30. I have feelings of apathy.
31. I experienced a feeling when the death occurred that "something died within me."
32. Aches and pains seldom bother me.
33. I find I am often irritated with others.
34. I could not cry until after the funeral.
35. I feel that I may in some way have contributed to the death.
36. I find myself performing certain acts which are similar to ones performed by the deceased.
37. I made the funeral arrangements.
38. I lack the energy to enjoy physical exercise.
39. I rarely feel enthusiastic about anything.
40. I feel that grief has aged me.
41. I have never dreamed of the deceased as still being alive.
42. I find myself frequently asking "Why did the death have to happen in this way?"
43. I sometimes have difficulty believing the death has actually occurred.
44. I feel a strong desire to complete certain unfinished tasks the deceased had begun.
45. I have often dreamed of times when the deceased was living.
46. I am often irritable.
47. I have dreamed of the deceased as being dead.
48. I feel extremely anxious and unsettled.
49. I feel tenseness in my neck and shoulders.
50. Sometimes I have a strong desire to scream.
51. I am so busy that I hardly have time to mourn.
52. I feel anger toward God.
53. I have the urge to curl up in a small ball when I have attacks of crying.
54. I feel the need to be alone a great deal.
55. I rarely think of my own death.
56. I find it difficult to cry.
57. Looking at photographs of the deceased is too painful.
58. Life has lost its meaning for me.
59. I have no difficulty with digestion.
60. I have had brief moments when I actually felt anger at having been left.
61. I have no trouble sleeping since the death.
62. I have a hearty appetite.
63. I feel healthy.
64. It comforts me to talk with others who have had similar loss.
65. I yearn for the deceased.
66. I seldom feel depressed.

67. I have the feeling that I am watching myself go through the motions of living.
68. Life seems empty and barren.
69. There are times when I have the feeling that the deceased is present.
70. I often take sedatives.
71. I have frequent mood changes.
72. The actions of some people make me resentful.
73. My feelings are not easily hurt.
74. I am losing weight.
75. Small problems seem overwhelming.
76. I sometimes feel guilty at being able to enjoy myself.
77. I frequently have diarrhea.
78. I often wish that I could have been the one to die instead.
79. I have lost my appetite.
80. I sometimes talk with the picture of the deceased.
81. I am not interested in sexual activities.
82. At times I wish I were dead.
83. It is hard to maintain my religious faith in light of all the pain and suffering caused by the death.
84. I seem to have lost my energy.
85. I dread viewing a body at the funeral home.
86. I find myself idealizing the deceased.
87. I have problems with constipation.
88. I frequently take long walks by myself.
89. I avoid meeting old friends.
90. I have a special need for someone to talk to.
91. It often feels like I have a lump in my throat.
92. I sometimes find myself unconsciously looking for the deceased in a crowd.
93. I seem to have lost my self-confidence.
94. I drink more alcohol now than before the death.
95. After the announcement of the death I thought, "This could not be happening to me."
96. I have nightmares.
97. The thought of death seldom enters my mind.
98. I have never worried about having a painful disease.
99. Funerals sometimes upset me.
100. I would feel uneasy visiting someone who is dying.
101. I often worry over the way time flies by so rapidly.
102. I have no fear of failure.
103. I am close with only a few persons.
104. The sight of a dead person is horrifying to me.
105. I always know what to say to a grieving person.
106. I often seek advice from others.
107. It does not bother me when people talk about death.
108. I cannot remember a time when my parents were angry with me.
109. I do not think people in today's society know how to react to a person who is grieving.
110. I never have an emotional reaction at funerals.
111. I often think about how short life is.
112. I am not afraid of dying from cancer.
113. I do not mind going to the doctor for check-ups.
114. I shudder at the thought of nuclear war.
115. The idea of dying holds no fears for me.
116. I never lose my temper.
117. I have always been completely sure I would be successful when I tried something for the first time.
118. I am not usually happy.
119. I feel that the future holds little for me to fear.
120. I cannot ever remember feeling ill at ease in a social situation.
121. I find myself sighing more now than before the death.
122. I spent a great deal of time with the deceased before the death.
123. It helps me to comfort others.
124. My family seems close to me.
125. I feel that I did all that could have been done for the deceased.
126. My religious faith is a source of inner strength and comfort.
127. I am smoking more these days.
128. I am not a realistic person.
129. I am awake most of the night.
130. I feel exhausted when I go to bed but lie awake for several hours.
131. I lose sleep over worry.
132. I often wake in the middle of the night and cannot get back to sleep.
133. I sleep well most nights.
134. Things seem blackest when I am awake in the middle of the night.
135. I can sleep during the day but not at night

BEM Sex-role Inventory

Directions: On the next several pages you will find listed a number of personality characteristics. We would like you to use those characteristics to describe yourself, that is, we would like you to indicate, on scale from 1 to 7, how true of you each of these characteristics is. Please do not leave any characteristic unmarked.

Example: sly

Write a **1 if it is never or almost never true** that you are sly.

Write a **2 if it is usually not true** that you are sly.

Write a **3 if it is sometimes but infrequently true** that you are sly.

Write a **4 if it is occasionally true** that you are sly.

Write a **5 if it is often true** that you are sly.

Write a **6 if it is usually true** that you are sly.

Write a **7 if it is always or almost always true** that you are sly.

---

1. Defend my own beliefs
2. Affectionate
3. Conscientious
4. Independent
5. Sympathetic
6. Moody
7. Assertive
8. Sensitive to needs of others
9. Reliable
10. Strong personality
11. Understanding
12. Jealous
13. Forceful
14. Compassionate
15. Truthful
16. Have leadership abilities
17. Eager to soothe hurt feelings
18. Secretive
19. Willing to take risks
20. Warm
21. Adaptable
22. Dominant
23. Tender
24. Conceited
25. Willing to take a stand
26. Love children
27. Tactful
28. Aggressive
29. Gentle
30. Conventional
31. Self-reliant
32. Yielding
33. Helpful
34. Athletic
35. Cheerful
36. Unsystematic
37. Analytical
38. Shy
39. Inefficient
40. Make decisions easily
41. Flatterable
42. Theatrical
43. Self-sufficient
44. Loyal
45. Happy
46. Individualistic
47. Soft-spoken
48. Unpredictable
49. Masculine
50. Gullible
51. Solemn
52. Competitive
53. Childlike
54. Likeable
55. Ambitious
56. Do not use harsh language
57. Sincere
58. Act as a leader
59. Feminine
60. Friendly

Appendix C

Statement of Purpose

Most of the past research on grief and bereavement has focused on the parents of the deceased, or on children whose parents have died. Very few investigations have been done with surviving friends. In fact, there has been so little done with this population that researchers in the field now commonly refer to these people as "the forgotten grievers."

What little evidence we have for the grief process in this group suggests that bereavement over the loss of a friend is very real, and often very painful and that the feelings associated with this loss can persist for many months, or years.

The purpose of this study is to look at college students, at Virginia Tech, to see how grief has effected them. We are interested in the individual differences which are evident across individuals who have lost a friend, and between people who have lost a friend and those who have not. We are also interested in the effects of time.

We will be asking you many questions, some of which may make you feel uncomfortable. For example, the first page of questions asks about suicide. Other questions require you to recall memories that may be somewhat painful for you to think about. Please realize that you are free to skip any question or group of questions. You can stop participating at any time, for any reason. You will not be asked to explain why you have decided to discontinue. Also realize that there is a space at the bottom of the consent form that you can check if you would like some information about counseling, either for your current issues, or for issues which may be brought up by your participation in this research. If you check this box, you will be contacted by telephone by myself (Kerri Weise). That telephone call, as well as the ensuing conversation will be held confidential unless you state or imply an intention to cause harm to yourself or others.

Are there any questions?

Appendix D

Informed Consent for Bereaved Group

We would like you to participate in a research study which examines how college students cope with the sudden death of a friend. We are asking you to provide us with some information about yourself so that we may compare this information the that which we receive from nonbereaved participants. Participation in this study requires you to complete several questionnaires which cover such topics as how you coped with this event, your thoughts, and your feelings about this event.

Personal data collected in this study will remain confidential and will not be used for any other purposes other than those described herein. You will be assigned a subject number, and your name will not be attached to the questionnaires. If the data are reported for scientific purposes, then no names or other identifying data will be included in such a report.

The assessment will take approximately 1 to 1-1/2 hours. If you are a student in the "Introductory Psychology" class, you will receive one (1) to two (2) extra credit points, based on how many hours your participate. If you are not in Introductory Psychology you will receive a stipend check for $5.

You may find it emotionally uncomfortable to be reminded about the sad and private feelings associated with your loss. While it is unlikely that this discomfort will persist for a long time after you participate in the study, you may be saddened by recalling these events. If you so desire, we will provide you with referral information so that you can continue to discuss your feelings with professionals. All information you give us will be kept confidential.

You may not directly benefit by participating in this research project, although the information you share with us will help to increase the base of knowledge in adolescent clinical psychology, and may be helpful to you or others in the future. Further, your participation in this study will allow you to have the opportunity to disclose the fact that you may not be adjusting well to your loss, and will enable you to find professionals who can help you.

I have read the above statement and I realize that I am free to withdraw my consent and discontinue participation in the study at any time without prejudice or penalty. I realize that I do not have to answer any questions that I do not want to.

I hereby agree to voluntarily participate in the research project described above and under the conditions described above.

_____ _____

Signature Date

_____ _____

Student ID Number Local Telephone #

This project has been approved by the Human Subjects Research Committee and the Institute Review Board. Any questions that the individual might have about the project should be directed to: Kerri A. Weise, B.S. (4098 Derring Hall - 552-4122); Russell T. Jones, Ph.D (4092B Derring Hall -231-5934). or to the Human Subjects Research Committee Chair, Helen Crawford, Ph.D.(5070C Derring Hall - 231-6520), or the Institute Review Board (Ernest R. Stout, Ph.D 306 Burruss Hall -231-9359).

_____ **Please contact me with further information regarding the availability of psychological services.**

Informed Consent for Non-bereaved Group

We would like you to participate in a research study which examines how college students cope with the sudden death of a friend. We are asking you to provide us with some information about yourself so that we may compare this information the that which we receive from bereaved participants. Participation in this study requires you to complete several questionnaires which cover such topics as how you cope with stressful events, your thoughts, and your feelings about death and about personal stressors.

Personal data collected in this study will remain confidential and will not be used for any other purposes other than those described herein. You will be assigned a subject number, and your name will not be attached to the questionnaires. If the data are reported for scientific purposes, then no names or other identifying data will be included in such a report.

The assessment will take approximately 1 to 1-1/2 hours. If you are a student in the "Introductory Psychology" class, you will receive one (1) to two (2) extra credit points, based on how many hours your participate. If you are not in Introductory Psychology you will be paid a stipend of $5.

You may find it emotionally uncomfortable to be reminded about the private feelings associated with stressful events. While it is unlikely that this discomfort will persist for a long time after you participate in the study, you may be upset by recalling these events. If you so desire, we will provide you with referral information so that you can continue to discuss your feelings with professionals. All information you give us will be kept confidential.

You may not directly benefit by participating in this research project, although the information you share with us will help to increase the base of knowledge in adolescent clinical psychology, and may be helpful to you or others in the future. Further, your participation in this study will allow you to have the opportunity to disclose the fact that you may not be adjusting well to certain stressors in your life, and will enable you to find professionals who can help you.

I have read the above statement and I realize that I am free to withdraw my consent and discontinue participation in the study at any time without prejudice or penalty. I realize that I do not have to answer any questions that I do not want to.

I hereby agree to voluntarily participate in the research project described above and under the conditions described above.

_____ _____

Signature Date

_____ _____

Student ID Number Local Telephone Number

This project has been approved by the Human Subjects Research Committee and the Institute Review Board. Any questions that the individual might have about the project should be directed to: Kerri A. Weise, B.S.(4098 Derring Hall - 552-4122); Russell Jones, Ph.D (4092B Derring Hall -231-5934). or to the Human Subjects Research Committee Chair, Helen Crawford, Ph.D.(5070C Derring Hall - 231-6520), or the Institute Review Board (Ernest R. Stout, Ph.D 306 Burruss Hall -231-9359).

_____ **I would like more information about available psychological services.**

Vita

Kerri Ann Weise

Personal Data:

Address:	36G Terrace View Apartments 200 Hunt Club Road Blacksburg, VA 24060
Telephone:	(703) 552-4122
Date of Birth:	September 30, 1968

Current Position:

Graduate student in Clinical Psychology Program — **August 1990 - present**
Virginia Polytechnic and State University

Education:

Bachelor of Science in Psychology

Colby College, Waterville, ME	**1989 - 1990** **1986 - 1988**
University of Edinburgh, Scotland	**1988 - 1989**

Honors:

Graduated summa cum laud with honors in Psychology, 1990
Colby Psychology Department Scholarship for Excellence, 1990
Phi Beta Kappa, 1990
Psi Chi, elected 1988; Vice President 1989 - 1990
Dean's List, 1986 - 1990

Graduate Course Work:

Assessment of Human Intelligence	Fall 1990
Statistics I & II	Fall 1990, Spring 1991
Research Methods	Fall 1990
Personality Assessment	Spring 1990
Psychopathology	Spring 1990
Developmental Psychology	Fall 1991
Human Neuropsychology	Fall 1991
Behavioral Assessment and Treatment	Fall 1991
Social Psychology	Spring 1992
Personality Psychology	Spring 1992
Applied Clinical Hypnosis	Spring 1992
Learning	Spring 1992
Clinical Marriage and Family Therapy	Fall 1992
Process in Relationships	Fall 1992

Clinical Experience

Clinical Externship: Community Mental Health **Fall 1992 - present**

As part of the requirement of the clinical program, graduate students complete 480 hours of supervised therapy in a facility outside of the Psychology Department. Current responsibilities include carrying a caseload of 11 adult clients, and co-facilitating a group for panic disorders. Supervisors: Cheri Warburton, M.S.; Dennis Cropper, Ph.D.

Graduate Practiccum Work **1990- present**

As part of the requirement of the clinical program, graduate students conduct a variety of individual, family, and group therapies at the Psychological Services Center. Sessions are viewed with ongoing supervision by a licensed clinical psychologist. Clinical responsibilities have involved a variety of clinical cases, including children, couples, and adults. Major emphasis has been on affective and anxiety disorders, including panic disorder, post-traumatic stress disorder, and work with incest survivors. Supervisors have included Thomas H. Ollendick, Ph.D., Russell T. Jones, Ph.D.,George A. Clum, Ph.D., Jack W. Finney, Ph.D.

Panic Group **Fall, 1991**

Conducted group therapy for individuals with panic disorder. Supervisor: George A. Clum, Ph.D.

Summer Practiccum **1991**

Employed during the summer as one of three therapists for the Psychological Services Center. Caseload averaged from 8 - 13 clients. Clinical responsibilities included conducting assessments and evaluations for attention deficit disorder, individual, and marital therapy. Supervisor: Richard Eisler, Ph.D.

Rape Crisis Hotline Volunteer **1986 - 1990**

Completed training program and served as on-call volunteer Waterville, Maine.

Emergency Medical Technician **1988**
Licensed in Maine and Massachusetts

Research Experience:

Grant: Adolescent Chronic Suicide Ideators — **Summer 1991-Spring 1992**

Working as a diagnostic assessor on an NIMH grant which is targeting adolescents between the ages of 18 and 24 who are experiencing chronic suicide ideation. Assessment instruments include Structured Clinical Interview for DSM-III-R, Personality Disorder Exam, Beck Interview for Suicide Ideation, and a variety of self-report instruments. Responsible for assessing Axis I and Axis II disorders as well as detailed information regarding suicidal thoughts and suicidal risk.
Supervisor: George A. Clum, Ph. D.

Master's Thesis: The effects of the death of a peer on adolescents — **1990 - present**

This study is designed to explore the long-term effects of peer loss on students between the ages of 18 and 22. In particular, this study focuses on the use of coping strategies, and the behavioral and affective manifestations of grief.

Research Assistant: Factors influencing client attrition rates — **1989-1990**

Assisted in research being conducted at the Kennebeck Valley Mental Health Center in Waterville, Maine. Duties included reading of client charts for the purpose of coding a series of factors, including demographic data, medical and psychiatric history.
Supervisor: Gregory Kolden, Ph. D.

Research Assistant: Interactions of children in a preschool setting — **1987-1988**

Assisted in research being conducted through Mount Holyoke College, to explore the social dynamics of preschool environments. Duties included coding of interaction maps and video tapes.
Supervisor: Patricia Ramsey, Ph.D.

Teaching Experience:

Graduate Teaching Assistant — **1990-1991**
Led discussion section of the Introductory Psychology class at Virginia Polytechnic and State University.

Professional Affiliations:

Student member, American Psychological Association, Division 12
Student member, Association for the Advancement of Behavior Therapy

Paper Presentations:

Clum, G.A., Weise, K.A., Weaver, T.L., Curtin, L.A., Priester, M., Yang,B. Issues in the assessment of suicidality. Presented at the Virginia Psychological Association on April 10, 1991.

Rohrman, N. L., & Weise, K.A. Psychology in Maine: 1794 - 1970. Paper presented at the annual meeting of Cheiron: The International Society for the History of the Social Sciences. June 1990.

Publications

Weise, K.A. (1989). How deaf children acquire language. Edinburgh, Scotland: Scottish Workshop Publications.

Present Clinical and Research Interests:

1. Psychic trauma its short and long term symptomatology.
2. Prevention and treatment of suicidal behavior, parasuicide, and self-mutilation.
3. Pathological grief, its short and long term consequences, and its treatment.
4. Gender differences in individuals who have been sexually abused.
5. Assessment and treatment of individuals who have been sexually abused.

Kerri A. Weise