The effect of a curriculum unit on death and dying on the ability of dietetic students to counsel seriously ill patients

Mary Jane Oakland

Iowa State University

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THE EFFECT OF A CURRICULUM UNIT ON DEATH AND DYING ON THE ABILITY OF DIETETIC STUDENTS TO COUNSEL SERIOUSLY ILL PATIENTS

Iowa State University

Ph.D. 1985

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The effect of a curriculum unit on death and dying on the ability of dietetic students to counsel seriously ill patients

by

Mary Jane Oakland

A Dissertation Submitted to the Graduate Faculty in Partial Fulfillment of the Requirements for the Degree of DOCTOR OF PHILOSOPHY

Major: Home Economics Education

Approved:

Signature was redacted for privacy.

In Charge of Major Work

Signature was redacted for privacy.

For the Major Department

Signature was redacted for privacy.

For the Graduate College

Iowa State University
Ames, Iowa
1985

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INTRODUCTION

In 1969, Elisabeth Kübler-Ross published her pioneering work On Death and Dying, and the American public became aware that dying patients have needs that often go unmet within their own families, as well as, within health care institutions. Kübler-Ross outlined three needs of dying patients that have implications for health professionals who work with them and their families (pp. 18-25). Patients want to be told the truth about the seriousness of their condition, and they need to be able to express their feelings about their life and approaching death. They fear being deserted by their primary care-givers. In order to meet these patient needs, the health professional must establish effective communication.

The ability of future clinical and private practice dietitians to empathically counsel seriously/terminally ill patients is a concern of dietetic educators. At the present time, the area of death education is not specifically required in the accreditation guidelines or the standards of education established for evaluating dietetic educational programs.

Most of the research reported on efforts to include death and dying in the training programs of health professionals was initiated in medical and nursing education programs (Dickinson, 1976). There is one report in the literature of an in-service training program on working with dying patients for clinical dietitians and students. The authors reported that this program was positively received by the dietitians involved (Dickens and Mullen, 1983).
Because of the lack of specific curricular materials on death and
dying to meet the particular needs of dietetic students, this project
was designed to develop a curriculum unit on this topic, to evaluate its
acceptance by students and faculty and to determine its effectiveness in
improving the counseling ability of students with seriously/terminally
ill patients.

The subject of death and dying can be approached from many
different disciplines and fields of study: philosophy, sociology,
psychology, medicolegal, and health education (Dietrich, 1980). It is
of interest to know if understanding some of the sociological and
psychological aspects involved in death and dying are related to
positive attitudes and empathic behavior toward the dying.

Several attitude characteristics and personality traits are of
interest in the study of the response of dietetic students to this kind
of unit. This emphasis would include assessing the level of death fear
and fear of interacting with the dying that dietetic students have.
Quint (p. 155, 1967) found in her study of nursing students that if the
student nurse was very anxious about death she was more apt to avoid
direct contact with dying patients. Students who were comfortable with
death and dying were more likely to make direct conversation with their
patients. It is also of interest to learn what students' attitudes are
concerning the professional role of dietitians working with
seriously/terminally ill patients.
Personality traits are reported in the literature as important
determinants of counseling effectiveness (Kemp, 1962; Milliken and
Paterson, 1967; Mezzano, 1969). These studies indicated that counselors
with higher empathy and lower dogmatism personality trait scores were
more effective in their work.

Evaluating clinical performance should be a feature of any
educational program that prepares clinical practitioners to insure that
a level of competent practice has been attained to protect the public.
In particular, it is of interest to evaluate the ability of students to
respond empathically to seriously ill patients.

It was the intent in this project to develop a death education
curriculum with attention to the specific needs of dietetic students.
The content and evaluation strategies were designed to address the three
areas of student growth: knowledge, attitudes, and behavior. The study
is intended to provide information for dietetic educators as they make
curricular decisions about educational preparation of future
practitioners.
If the needs of dying patients and their families are to be met by the helping and health care personnel, then it is necessary for professional training programs to provide opportunities for students to learn about the dying and mourning process and to develop communication skills for relating to this group of clients. To develop effective curriculum materials to help students meet the needs of dying patients, it is necessary to understand the field of study of death and dying, as well as the fears and attitudes surrounding the topic. The review of literature focuses on the following topics: communication between patients and health professionals; death fear as affected by demographic and professional role variables; attitudes toward the dying; personality traits and counseling effectiveness; availability of death education for health professionals; characteristics of death education curricula; and the effectiveness of death education in producing attitude and behavioral changes.

Behavior and Attitudes of Health Professionals

Communication with patients

Advanced technology has had an enormous impact in changing health care. Hospitals have evolved into industrialized, bureaucratic complexes. In the midst of the overwhelming complexities of computerized treatment techniques, there is the feeling that the patient-physician relationship has become depersonalized, and both
patients and physicians feel isolated from each other (Gorlin and Zucker, 1983).

An early study by Korsch, Gozzi, and Francis (1968), characterized communication patterns between patients and physicians. The research was conducted in the emergency clinic of a large metropolitan children's hospital. A sample of 800 patient visits were audio-recorded and the transcripts analyzed by the researchers to determine communication patterns between the parents of the children and the physicians. Interviews were held with the parents immediately after the physician had examined their child, and follow-up interviews were conducted two weeks after their visit to the emergency department. These interviews were designed to evaluate patient (actually the parents of the patients) perception of interaction with the physician, a rating of overall satisfaction, and an indication of the degree of compliance. Results indicated that 24 percent of the sample were moderately or highly dissatisfied with their experience. It was found that the communication skills of the physicians were a much more important determinant of satisfaction than whether or not the medical problem was solved. Neither the amount of time spent waiting nor the length of time of the actual patient-physician visit were related to the satisfaction-dissatisfaction ratings.

If there are gaps in patient-physician communication under normal clinical conditions, the difficulties in the interaction are magnified when both the patient and the physician must deal with a serious illness.
which is likely to be fatal. Gorlin and Zucker (1983) suggest from their review of the literature and experience teaching medical interns that, when terminal illness is encountered, the physician has an emotional response of sympathetic identification with the patient and feels frustrated and inadequate. The behavioral response to these feelings is often denial, reluctance to discuss the illness, or avoidance of the patient.

Elisabeth Kübler-Ross reported similar behavior patterns between physicians and dying patients in her book, *On Death and Dying*, (1969). She began her descriptive research of the psychological characteristics of dying patients in the mid-1960s at a large midwestern teaching hospital. As part of this work, she conducted interviews and seminars between terminally ill patients and medical, nursing and theological students and staff. Kübler-Ross found at the beginning of her research that it was very difficult to obtain permission from attending physicians to interview their terminally ill patients. After comparing her experiences, working with medical staff, residents, interns, and medical students, Kübler-Ross concluded that the more training a physician received the less ready they were to become involved with the dying (p. 218).

Communication interactions of nursing staff and terminally ill patients in a geriatric hospital were studied by Kastenbaum (1967). Nurses and attendants (n=199) were asked how they would respond if a patient brought up the subject of death. The self-report responses were
categorized and the results indicated that fewer than 20 percent of the staff would try to openly discuss the patient's feelings when the patients brought up the subject of death. The more usual closed responses by the nursing staff were denial, fatalism, and changing the subject.

Ross (1978) also evaluated the responses nurses gave to terminally ill patients. A group of 58 nurses were asked how they would respond to the verbal statements made by dying patients in several videotaped vignettes. Results indicated that 88 percent of the nurses gave "closed" responses indicating a high level of discomfort in discussing death with terminally-ill patients.

A survey of attitudes of physicians (n=85), residents (n=52), and nurses (n=346) on the care of the terminally ill was conducted by Kincade (1982-83). The results indicated that 20 percent of the sample reported a high degree of discomfort when talking with dying patients. No differences were found among the three groups of professionals on their comfort in talking with terminally ill patients. No references were located that indicated whether dietitians responses to dying patients are similar to these of nurses and physicians.

Researchers have considered a number of factors to explain the communication difficulties that health professionals have with persons with potentially fatal disease conditions. Some of the variables that have been studied are fear of death or death anxiety, attitudes toward death and the dying, and the personality traits of empathy and closed-mindedness, or dogmatism.
Death anxiety

In the literature both psychological and educational studies include measures of death fear or anxiety. As Hoelter (1979) points out, defining death fear is difficult because it is not a single, specific fear. The operational definition of death fear or anxiety used in his research is "an emotional reaction involving subjective feelings of unpleasantness and concern based on contemplation or anticipation of any of the several facets related to death" (Hoelter, 1979; Hoelter and Hoelter, 1980-81).

Kurlychek (1978-79) reviewed the availability of methods to measure death fear or anxiety and attitudes toward death and dying. He points out that the most widely used attitude scale with the greatest amount of normative data is the Templer Death Anxiety Scale. This 15-item, true-false scale includes various life experiences related to death anxiety. The items are summed to give a single scale score. Although the scale is widely used, Durlak (1982) has criticized its continued use because the exact factor structure of the scale is not known and "it cannot be determined how multiple factorial components contribute to the total scale score".

In a study with undergraduate students, Holmes and Anderson (1980) assessed death anxiety by asking students to respond to the single statement, "I am afraid of death," by indicating their degree of agreement on a Likert-type scale. Pearson correlation was performed between this score and the score obtained on Templer's Death Anxiety
Scale. A statistically significant relationship (p < .01) was found between the two measures, and the authors conclude that rating the single statement is an efficient method of dividing students into high and low death-anxiety groups.

Collett and Lester (1969) developed a death anxiety scale that contained the following separate measures of death fear: fear of death of self, fear of death of others, fear of dying of self, and fear of dying of others. Low correlations were found among these four subscales indicating that each measures a different dimension of death fear.

Further development of death anxiety scales has been done using a factor analytic approach (Nelson and Nelson, 1975; Nelson, 1978; Hoelter, 1979; and Durlak and Kass, 1981-82). Nelson and Nelson (1975) developed a four factor scale that was designed to measure death avoidance, death fear, death denial, and reluctance to interact with the dying. After further work, Nelson (1978) found that reluctance to interact with the dying was a subset of the disengagement from death scale. These items were combined to increase the internal consistency of the scale. In a factor analytic evaluation of 15 self-report death attitude scales, Durlak and Kass (1981-82) found that the Collett and Lester Fear of Dying of Others and the Nelson and Nelson Reluctance to Interact with the Dying Scale loaded on the same factor.

Relationship of demographic variables In addition to the research activity in developing methods of measuring death fears and
anxiety, there have also been studies to determine the relationship between death fear and various demographic and biographic variables. Other groups have not only tried to measure and characterize death fears but also to determine whether or not these fears can be modified positively by educational intervention.

**Age** Templer, Ruff and Franks (1971) found no relationship between age and death anxiety, as measured by the Templer Death Anxiety Scale, when data from samples of diverse populations (n=2559) were analyzed. The subjects were college students, psychiatric patients, parents, young teenagers and upper-middle-class apartment dwellers. Similar results indicating no correlation between age and attitudes were found by Lester (1972) when he administered the Collet-Lester Fear of Death scales to 46 psychology students (age range 17-50 years).

**Sex** The gender of the subjects has also been studied in relation to degree of death anxiety. In the same group of studies reported above by Templer et al. (1971), females in all sample groups had significantly higher death anxiety scores than male subjects. Ray and Najman (1974 found that female sociology students were more death anxious than male students as determined by the Templer Death Anxiety Scale (n=206). However, in two other studies of college students using the same Death Anxiety Scale, no differences in death anxiety related to gender differences were found (Templer and Dotson, 1970; Templer, 1972).

In a more recent study, Cole (1978-79) used the Templer Death Anxiety Scale to assess the relationships among gender, marital status,
and death fear. His results indicated there were no differences in anxiety scores for married males and females, but the single males had higher death anxiety scores than the single females.

When Lester (1972) contrasted the scores for male and female psychology students (n=46) on his four death fear sub-scales, the females were found to have greater fear of death of self, death of others, and dying of self than the male students. No gender differences were found in regard to the fear of dying of others or general fear of death.

**Religion** The relationship of death anxiety to religious affiliation, belief system and amount of religious activity has also been studied. Data from 213 undergraduate students indicated no significant relationship between scores on Templer's death anxiety scale and membership in various Christian religious denominations (Templer and Dotson, 1970).

However, in another study by Templer (1972), he administered his Death Anxiety Scale to students who had participated in an inter-denominational, evangelical retreat. Results from this group of students, who were very religiously involved, showed that scores on the Death Anxiety Scale were lower than scores for the control group.

In the previously cited study of Ray and Najman (1974), no differences in death anxiety as measured by the Templer Death Anxiety Scale were found between religious believers and unbelievers. These authors also developed a death acceptance scale. Unbelievers were more
accepting of death than those who indicated they were religious believers. In contrast, Cole (1978-79) found that persons with a religious preference have higher Death Anxiety Scale scores than those who have no religious preference.

**Death of friends or family members** Some researchers have explored the relationship between death anxiety and previous experience with the death of a friend or family member. Lester and Kam (1971) conducted a questionnaire study of 100 students at a women's college. Half of the students had experienced the death of a close friend or relative within the past five years, and the others had not. The students who had experienced a more recent death thought of their own death more frequently, were more likely to picture death as horribly painful, and were more inclined to think of some specific disease as a cause of death. The two groups of students were not different in their responses to these items: imagining oneself as dead or dying, thinking about suicide, fearing death, or worrying over whether a future life exists. Although the authors found consistent differences in the two groups of students, the differences were small suggesting "that recent loss serves only to modify very slightly existing attitudes toward death."

In another study of 375 male and female undergraduate students (Hoelter and Hoelter, 1980-81), the students who had been exposed to death within the past five years scored higher on attitude scales that measured fear of the dying process, fear of the unknown, fear of the
death of significant others, fear of the dead, and fear of premature death.

A group of undergraduate psychology students (n=126) completed a battery of psychological tests including scales measuring death fear and preoccupation with death (Selvey, 1973). Female students who had lost a close friend or relative within two years scored higher in death fear than the young women who had not experienced a death recently. There were no differences in scores measuring preoccupation with death. The relationship of recent loss and increase in death anxiety scores was not found for male students.

In the study of married and single males and females that was cited previously (Cole, 1978-79), the subjects who had lost a family member or friend within the past year had lower death anxiety scores on the Templer Death Anxiety Scale than those who had not experienced a recent loss.

These results on the relationship of previous death experience to death fears are not consistent and do not reflect the internal changes that grieved individuals feel have occurred.

Differences among health professionals Since most Americans die in health care institutions, it is a common experience for professionals within these institutions to encounter death. The anxiety levels of the professionals working with the dying have been examined to some extent, but comparisons between studies is difficult due to the variety of attitude scales used.
In early work Feifel, Hanson, Jones, and Edwards (1967) compared death anxiety scores for physicians, medical students, seriously and terminally ill patients, and healthy lay individuals. Their findings indicated that among the four groups studied, the physicians had the highest death fear ratings. Medical students were the next most fearful group followed by the patients and then the healthy individuals.

In an attempt to understand death fears in future physicians, Linn, Moravec and Zeppa (1982) used the Collett-Lester death anxiety scales to measure the effect of clinical experience on 174 junior medical students. The instrument was administered before and after a three-month surgical clerkship which was an early clinical experience for these medical students. There were no significant changes in fear of death or dying of self or dying of others. The fear of death of others was significantly lower at the end of the clerkship. There was significant negative attitude change toward dealing with the dying patient's family. Students with negative attitudes about dying patients and their families were more likely to indicate indecision about their choice of a medical specialty. A significant relationship was also located between negative attitudes toward dying patients and interest in research or teaching rather than clinical medicine. Death fear scores were similar for male and female medical students.

The fear of death was measured in 256 nursing undergraduate and graduate students and faculty using the Collett-Lester Fear of Death Scales (Lester, Getty, and Kneisl; 1974). In general, death fear
decreased as academic preparation increased. When nurses (n=130) in a work situation, rather than an academic setting were studied, Bushnell (1982) found no association between the level of academic preparation and death anxiety scores. The mean score on the Templer Death Anxiety Scale for this sample of nurses was higher than the score reported for the general population by Templer (1970).

Goodwin and Day (1983) conducted a mailed attitude survey of 241 registered dietitians from the midwest. Although the death anxiety scale used in the study was not identified, the authors stated that the dietitians had lower death fear scores than the general population. A statistically significant positive relationship was found between death anxiety and years of professional practice. The dietitians were asked to estimate the amount of time they spent with acutely, chronically, and terminally ill patients. They estimated that they spent the least time with terminally ill patients.

**Attitudes of health professionals toward death and the dying**

In addition to research studies on the level of death fear or anxiety among health professionals, there are studies that measure a range of other attitudes that help broaden our understanding of the feelings of health professionals who work with dying clients.

Hatfield, Hatfield, Geggie, Taylor, Soti, Winthers, Harris, and Greenley (1983-84) conducted an attitude survey of a wide range of employees and professionals at a large university teaching hospital. Although 1080 individuals returned the questionnaire this was a return
rate of only 45 percent. The instrument included two self-report items related to discussing death and terminal care with patients. Physicians and the social service group of employees reported being more at ease talking with dying patients than the nurses did. Although dietitians apparently were included in the technical group of employees in this study, no results were reported that characterized the attitudes held by this group.

Another study (Campbell, Abernathy, and Waterhouse, 1983-84) tried to determine whether or not attitudes about death are different for physicians and nurses. A stratified sampling technique was used to include male nurses and female physicians in the sample to obtain the same gender ratios for the two professions. Results indicated that nurses had a more positive view of death as "rebirth, tranquility, and victory". The physician house officers rated death as a negative event with terms such as, "unsafe, alone, forgotten, and cold". Sex differences were not a significant factor in the rating of attitudes. Unstructured interviews were conducted with a smaller sub-sample to obtain more information on the differences between the attitudes of physicians and nurses. The authors concluded that professional roles were a major shaping factor in the subjects' attitudes toward death. Physicians perceived themselves as "the one who is responsible"; and nurses, as "the one who cares".

Possible relationships between death fear and attitudes in nurses were studied by Stoller (1980-81). She found that the nurses with high
scores on the Collett-Lester fear of dying of others sub-scale were uncomfortable with unstructured interactions with dying patients (i.e., talking to dying patients, or finding terminally ill patients crying). However, scores on the death fear scales explained only a small proportion of the variance which indicates that death fear of others is only part of the explanation of nurses' attitudes toward the dying.

The importance of perception and socialization into health professional roles and the effect this may have in determining attitudes has educational implications. The finding that death fear accounts for only a small part of the variance in determining attitudes in working with the dying may indicate that reducing death fear may not need to be an objective of educational programs. Personality factors in addition to attitudes and fears have been studied that may also have important implications in establishing effective communication and counseling between health professionals and patients.

**Personality traits and counseling effectiveness**

Problems in communication between health professionals and patients were identified earlier in this review. For health care to be more humane, professional training needs to help health professionals treat their patients as total persons (Boles, 1976). Improving interpersonal communications has the potential to enhance patient satisfaction and compliance through increased counseling effectiveness, and to decrease the defensiveness of the health professional regarding illness and death. Efforts to develop affective skills in students involve teaching
communication methods and self-understanding of attitudinal and personality traits. Two personality traits that have been studied in assessing counseling effectiveness are the positive factor, empathy, and the negative factor, dogmatism.

**Dogmatism**  
Our ability to understand and measure the personality trait dogmatism is due to the extensive work of Milton Rokeach reported in *Open and Closed Mind*, (1960). His studies indicate that people have a generalized belief system that can be measured on a continuum between open- and closed-mindedness. Rokeach states that "the open mind has the ability to receive, evaluate and act on relevant information on its own intrinsic merits" (p. 57). The closed mind would respond to new information with a closed, stereotypical response.

The relationship of the personality trait, dogmatism, to counseling effectiveness was studied by Mezzano (1969). The Rokeach Dogmatism Scale was administered to 37 graduate counseling students. The counseling effectiveness of the students was determined by performance evaluation. Results indicated that students with high dogmatism scale scores (indicating closed-mindedness) received lower counseling effectiveness ratings. Other studies (Kemp, 1962; and Milliken and Paterson, 1967) found this same inverse relationship between dogmatism ratings and counselor effectiveness.

The relationship of the level of dogmatism in nurses and their attitudes toward caring for culturally different patients was investigated in a study of 163 nursing faculty members (Ruiz, 1981).
The attitudes of faculty members were measured because of their role-modeling influence on nursing students. The findings indicated that nursing faculty members with low Dogmatism Scale scores (open-minded) did indeed have more positive attitudes toward caring for culturally different patients.

**Empathy**

In order to foster client satisfaction, suggestions have been made to education programs in the health professions to improve the ability of their students to establish effective interactions with clients (Boles, 1976; Kahn, Cohen, and Jason, 1979). One personal characteristic that has been identified as crucial to the formation of helpful relationships with clients is empathy (Rogers, 1975). Empathy has been defined as the "ability of one person to know what another is experiencing" (Bachrach, 1976). Robert Hogan (1975) has pointed out that empathy should be viewed as having both a state and trait dynamic. Trait empathy would refer to the personality construct that is probably determined by genetics and early experience; state empathy would refer to the qualities of warmth and understanding demonstrated within inter-personal interactions.

The personality characteristic of empathy has been evaluated in medical and nursing students. Hornblow, Kidson, and Jones (1977) studied the extent of relationship between scores on the Hogan Empathy Scale (Hogan, 1969), self-report empathy scores, peer and patient ratings of empathy for 30 medical students. For the variables measured, there was a significant (p < .05) relationship between the peer empathy
ratings and the Hogan Empathy Scale score. The results did not
demonstrate any significant relationships among the other measures of
empathy. These authors agree with the assessment of Hogan (1975), that
empathy is not a single-dimensional entity.

Empathy was measured in another group of 93 medical students with
the Hogan Empathy Scale (Diseker and Michielutte, 1981). The scale was
administered to first year medical students before and after a course on
patient interviewing. To look at long term results, the instrument was
again administered just prior to their graduation from medical school.
Results indicated a slight decrease in Empathy Scale scores when the
results obtained immediately after the course were compared with the
pre-course levels. This decrease in empathy scores was also found when
the scores on the pre-course and graduation administrations of the
instrument were compared. Although the decrease in empathy scores was
slight, the difference was statistically significant (p < .05).

Another study of differences in empathy in entering medical
students was reported by Streit-Forest (1982). The battery of tests
used to profile the capacity for empathy in these students (n=289)
included the Hogan Empathy Scale and the Rokeach Dogmatism Scale.
Students who chose medicine for humanistic reasons scored higher on the
empathy scale; and those with high Dogmatism Scale scores had low
Empathy Scale scores (p<.05).

A similar large study (n=533) of empathy and personality styles of
medical students was reported by Kupfer, Drew, Curtis, and Rubinstein
A shortened version of Hogan's Empathy Scale was administered to the freshman class of a medical school for four years. There were no significant differences in scale scores between any of the classes nor between the male and female students.

MacDonald (1977) used the Hogan Empathy Scale to measure empathy traits in male and female nursing students. This was a small study of 15 male and 15 female nursing students. A control group of students was randomly selected. Findings indicated that female students not enrolled in nursing had the highest empathy scale scores. The scores for the males in nursing were next, followed by the scores for the males not in nursing. The group of students with the lowest empathy scale scores were the female nursing students.

In spite of the probable importance of personality traits, particularly dogmatism and empathy, in counseling effectiveness, no references were located that reported either dogmatism or empathy scores for dietitians or dietetic students.

Death Education

If health professionals are to develop more positive attitudes toward working with the dying and to learn more effective counseling skills, it is necessary to include appropriate educational opportunities where these changes can occur.
Availability of death education for health professionals

Surveys of the availability of death education in medical schools in the United States were completed by Dickinson (1976, 1981). In the first study, he found that about three-quarters of the schools that responded to his questionnaire had some type of death education that was added to the curriculum since 1970. Very few programs offered a full-term course, and most indicated that they had only a lecture or two. Only 71 percent of the schools required even half of their students to take the death education offerings. In the follow-up survey five years later (Dickinson, 1981), the researcher noted a small increase in death education activity by the schools. There were fewer schools that offered no death education opportunities, and the number of full-term courses increased to 16 for 123 medical schools.

A similar survey was also made of the Canadian medical schools (Perez, Gosselin, and Gagnon, 1980). Twelve of 16 schools surveyed offered death education. The schools, which had death and dying curriculum units, included them in human behavior courses. For the majority of the students, the course on human behavior was required. The average length of instruction in death education in the Canadian medical schools was 4.2 hours of instruction.

When a sample of nursing schools were surveyed by Thrush, Paulus, and Thrush (1979), five percent of the schools required a death and dying course and 40 percent offered it on an elective basis. About half of the schools that reported having death and dying educational options
indicated that the students had direct contact with terminally ill patients.

No similar surveys concerning the availability of death education in the curricula for students in any of the allied health professions, including dietetics, were located.

Characteristics of curricula in death education

The history of the development of death education in the United States during the period of 1960-75 has been reviewed by Leviton (1977). He points out that there is a marked variation in the students who enroll in death education courses, as well as the particular focus of the courses offered. Students are "diverse in their attitudes concerning death, knowledge about death, fears, and previous experience with death" (p. 261). The courses themselves vary in their target audience; target educational domain (cognitive, affective, or activity); number of students; endorsing disciplines; instructional methodology; and outcome goals. These classification factors for course variation in death education are useful in categorizing descriptions reported in the literature.

Barton, Flexner, van EYS, and Scott (1972) described an interdisciplinary course developed in a school of medicine as an elective for third and fourth year medical students. The faculty for the course were from psychiatry, internal medicine, ethics, and pastoral care. The class size was small (six to ten students). The objectives and instructional activities were selected to include three educational
domains (cognitive, affective, and activity). Topics included psychological understanding of the acute and chronic grief process, legal and ethical considerations in life-threatening situations, and cultural diversity in religious beliefs toward death and after-life. Group discussions and role-playing were used to involve the affective response of students. Several group interviews of patients were done to promote interaction of the students with the dying in much the same manner as reported by Kübler-Ross (1969). The goal of the course was professional preparation of future physicians to meet the needs of dying and bereaved patients as outlined in an earlier paper by the senior author (Barton, 1972). No formal evaluation of the effectiveness of the course in meeting its goals and objectives was reported.

An early, important study of the socialization process of nursing students working with the dying in the clinical setting was completed by Quint (1967). She described the importance of sensitive interaction between the faculty and students in relation to assimilating clinical experiences. The type of clinical assignments given to students in various nursing programs was analyzed. This descriptive study led the author to conclude that it was in the experience of working with dying patients and their families that students learned truncated, closed communication patterns as defense mechanisms against their own feelings of inadequacy (p.106). She recommended educational changes that prepare students to assimilate their own feelings and to relate more openly to dying patients (p. 227). This study provides a vision of the
possibility of educating a health care provider who is able to meet the needs of dying patients while maintaining his/her own emotional health. However, specific guidelines on meeting these goals in nursing education are not outlined.

An interdisciplinary, elective course in death education for undergraduate students offered in a school of nursing was described by Swain and Cowles (1982). Content areas included dealing with death, ethical and legal issues, grief and survivorship, and community resources. An innovative aspect of this course was the inclusion of a weekend workshop in which students were able to deal with the affective objectives of the course in a small group support setting. The Collet-Lester Fear of Death Scale was administered before and after the course, and the scores were compared with those of a control group of students not enrolled in the course. No overall differences were found in the fear of death scores between participants and the control group, yet the overall self-reported student response to the course was very positive. The students enrolled were predominately nursing or pre-nursing majors, but the relationship of any concurrent clinical experience with this course was not indicated.

Curricular goals for death education courses for medical students were proposed by Bloch (1976). From his review of the literature, the course objectives identified were the following: the removal of barriers to approaching the subject of death, an appreciation by the student of his own mortality, the contribution to the student's
psychological growth, an appreciation of what it is like to be dying, an appreciation of the needs of the family, an appreciation of the roles of other health care personnel, the cultural aspects of death and dying, the ethics of death and dying, and management of the physical distress of the dying. Bloch recommends using a small-group interactive format for the course in order to facilitate the achievement of the experience-based objectives.

This proposed course outline (Bloch, 1976) was adopted by Dietrich (1980) as a curricular framework of death education for allied health students. She organizes content in death education around five dimensions: philosophical, sociological, psychological, medicolegal and health educational. The objectives of Bloch, cited above, would fit into the framework of these five broad content areas. Dietrich recommends requiring the course for the allied health professions with a considerable amount of direct patient contact, and as an elective for students with little patient contact.

A survey describing the characteristics of death education curricula used in U.S. medical schools was conducted by Smith, McSweeney, and Katz (1980). In nearly 80 percent of the programs studied, the death education units were initiated in response to faculty concerns rather than student requests. A wide variety of medical specialties and academic disciplines were represented by the faculty teaching the courses. The most common objectives for the courses were the knowledge of the dying process and an awareness of feelings of
personal mortality. A less common objective was the development of skill in the care of terminally ill clients. Course content outlines to meet these objectives showed a great deal of variation among the programs.

Use of film in death education

In the above study by Smith et al. (1980), the authors found that more than three-quarters of the medical schools included videotapes, films and slides as instructional resources in their death education classes. This literature search located only two studies that evaluated the effect of using videotape or film in death education. York and Weinstein (1980-81) used videotape in a study of bereaved children. The videotape depicted a child of similar age working through her feelings of anger, guilt, and depression in response to the death of her father. The children in the treatment group, who were shown the film, spoke more frequently about death than the control group of bereaved children who did not view the film.

Film was also used by Engel (1980-81) in a workshop about grief and mourning. His article is a descriptive presentation of group response to the documentary film, "What Happened to Pity?". This film describes the responses of Welch villagers after 144 children and adults were killed in a mining accident. The author describes the emotional impact of watching the film on the learners and includes examples of the dialogue from the post-film discussion. He concludes that the film made an impact on understanding the grief process by the participants that did not occur when only lecture instruction was included.
Effectiveness in producing attitude and behavior changes

Leviton (1977) reviewed the development of death education courses during the preceding 20 years in the United States. In the middle to late 1970s, interest in learning about death and dying seemed to reach a fever pitch with courses and workshops springing up in high schools, colleges, and adult continuing education programs. Most of these programs were not evaluated, so their effect on changing death related fears is unknown. For the programs that were described in the literature, the results were both positive and negative.

Tobacyk and Eckstein (1980-81) contrasted 30 students in a death education course with a control group of psychology students. Instruments were administered to measure death threat, death concern, and trait anxiety. Results indicated a statistically significant (p<.05) reduction in death threat scores for the death education students after completion of the course. On the basis of the trait anxiety scale, the students were divided into categories of either high or low anxiety levels. Death education students who had a lower anxiety trait score had a larger decrease in scores on the death concern instrument than the students with high anxiety trait scores.

Another study that indicated a reduction in death fear or anxiety following a death education course was reported by Leviton and Fretz (1978-79). These authors compared the scores of death education and general psychology students (n=87 for each group) on the four sub-scales of the Collett-Lester Fear of Death instrument. After the course the
death education students had significantly lower scores on two of the sub-scales.

However, other studies do not indicate this positive relationship between educational intervention and reduction of death fears. Bell (1975) found that death education students (n=24) had more frequent thoughts about death than students in a randomly selected control group. There were no significant differences between the scores of the experimental and the control groups for three dimensions of death attitudes: fear of death, feelings about discussing personal death with others, and feelings about discussing death with a terminally ill friend.

One question that can be raised in evaluating changes in student scores is: Are students who elect to take these courses different from those who do not? A study that was able to control for any self-selection differences was reported by Wittmaier (1979-80). He compared a small group of students (n=14) who took the course with a group of students who had registered for the course, but were denied access due to space limitations. The students in the course had higher scores on the Templer Death Anxiety Scale than the control group. However, the students who took the course rated themselves as more comfortable in talking with a dying person than those not enrolled.

The literature does address the effectiveness of death education programs for nursing and medical students and practitioners. Combs (1981) evaluated the effect of two death education curriculum models
(lecture and experiential) with two student groups (nursing and education majors). Death anxiety and acceptance were measured as pre-, mid-, and posttests. Results indicated that neither curriculum model decreased death anxiety for either group of students. The death education students who experienced the lecture curriculum model had higher death anxiety scores than the group who received the experiential learning activities. However, the effect of the curriculum model on death anxiety had opposite results with nursing students. Nursing students in the experiential curriculum had lower scores than those in the lecture-based model.

Murray (1974) studied the effect of a six-week workshop for medical and surgical staff nurses (n=30) on death anxiety measured with the Templer Death Anxiety Scale. There were no differences between the pretest and the posttest scores when the posttest was given at the end of the course. However, when the posttest was repeated four weeks after the course, there was a significant decrease in death anxiety scores.

As mentioned previously, Bushnell (1982) found no relationship between the type of academic/professional training that registered staff nurses had obtained and scores on the Templer Death Anxiety Scale. However, she found that nurses who reported death and dying content in their professional education programs had significantly higher death anxiety scores and reported feeling less comfortable caring for dying patients than nurses who had not experienced death and dying instruction in their training programs. Nurses who had worked for more than ten
years or less than four years reported feeling more comfortable working with terminally ill patients than did nurses who had worked an intermediate length of time (five to nine years).

Dickinson and Pearson (1980-81) conducted a questionnaire attitude survey of physicians who had received a formal class in death education during medical school, and contrasted their responses with a control group of physicians who had not received instruction. The physicians, who had completed the death education course, indicated they felt more comfortable with dying patients than physicians with no extra training. Since many of the death education offerings in medical schools are not required, the authors suggest that electing to participate in death education may confound the positive relationship found between attitudes toward dying patients and taking a death education course.

A descriptive study of affective learning in an introductory clinical medicine course for first-year medical students (n=70) was reported by Kahn, Lass, Hartley, and Kornreich (1981). The objectives for this course focused on two affective areas: coping with feelings about the large amount of material to be learned in medical school; and about illness, disability, and death and dying. The authors found that the students progressed through phases that correspond to the theoretical framework of the mourning process as described by Lindemann (1944) and Kübler-Ross (1969). The grief phases identified in the medical students were confusion, denial of the loss of self-concept, anger and depression, and resolution or reintegration of self-concept by
coping through learning. An instrument was developed that identified behaviors that corresponded to the four phases in the theoretical model. The school year was divided into four time periods, and three performance evaluations were made for each student during each time period. Behavior ratings were performed by trained professional social workers. Results indicated that attitudes toward professional learning and disability and death did improve significantly over time. The authors believe this research indicates that previous attitudes toward illness and death are modified during the introduction to clinical medicine experience. This modification of attitudes requires changes in self-concept that involve a process that corresponds to the theoretical framework proposed for understanding the grief process.

Preparation for clinical dietitians to effectively relate to seriously ill and dying patients is necessary just as it is for nurses and physicians. The only study located in the literature on death education for dietitians and dietetic students is a report of a workshop offering by Dickens and Mullen (1983). Nearly all of the participants (n=25) agreed that the program about death and dying was relevant to professional concerns in clinical dietetics. No further data were provided to evaluate the effect of the program on the participants.

This review reflects the fact that thanatology (the study of death) is a new field. The fear and attitude measures are still undergoing development and revision. Therefore, measuring the effectiveness of educational programs is difficult and the results have not always been
positive. However, the pain of dying patients and their families from being misunderstood and ignored by health care providers is a compelling reason for educators to attempt to provide the next generation of health professionals with the understanding and the communication skills to care for them sensitively. The courses described by Swain and Cowles (1982) and Kahn et al. (1981) seem to fit into the developmental process of socializing students into the health care experience, and therefore are important models in developing curricula to meet specialized student needs.
METHODOLOGY

The major goal of the project was to provide learning opportunities for dietetic students to develop the abilities to understand and respond effectively as health care professionals to the needs of seriously/terminally ill patients and their families. The literature search did not locate any instructional plans in death education that would meet the time constraints and the needs of dietitians in particular. Therefore, a curriculum unit was developed and the effectiveness of implementing the unit was evaluated. The methods used in developing and evaluating the curriculum unit will be discussed in this chapter.

Objectives

Since the content in death education engages students in a very personal way, careful evaluation of the ramifications of implementing this curricular change was considered. The major objectives were to:

1. Develop a death education curriculum for dietetic students.
2. Determine if changes in the following attitudes occurred:
   fear of death, fear of interacting with the dying, and fear of working professionally with seriously/terminally ill patients.
3. Determine if there was a gain in knowledge related to selected psychological and sociological concepts in death and dying.
4. Investigate the relationship between demographic and biographic variables and clinical performance evaluation scores.

5. Investigate the relationship between the personality traits of empathy and dogmatism and clinical performance.

6. Determine if there was a change in empathic behavior by the students toward patients in counseling situations following the curriculum unit.

Development of the Curriculum Unit

The only available reference that related to death education for dietitians was the report of a workshop for clinical dietitians and dietetic students by Dickens and Mullen (1983). The focus of the article was the degree of acceptance of the workshop by the dietitians, and no attempt was made to evaluate the effectiveness of the workshop on clinical practice.

Since death education, as a subject of study, has developed only very recently; and due to the paucity of materials intended for dietitians; the literature was reviewed for descriptions of existing programs primarily in medical and nursing education as a basis for designing a curriculum unit for the intended audience of dietetic students.

The model for curriculum development of Tyler (1949), as extended by Taba (1962), was used as a guide in producing the curriculum unit.
This model develops tentative general objectives by considering needs and information from three sources: students, society, and the subject matter area.

Identification of objectives from the learners

Oakland and Schultz (1982) conducted a preliminary study on the attainment of affective objectives by 37 junior and senior dietetic students in a Coordinated Undergraduate Program (CUP). Junior students indicated that they had made only fair progress toward achieving the objective of developing a value system for working with the terminally ill. Attainment of this objective was scored significantly higher (p < .05) by the senior students. In an oral course evaluation conference, this same group of students expressed doubts about their abilities to work with terminally ill patients.

Dietrich (1980) has suggested that the criterion for the decision to include death education in the curriculum for allied health professionals is related to the amount of direct interaction there is between the health professional and dying patients. She suggests that death education be elective for students preparing for professions with very little patient contact, but mandatory for those with direct patient interactions.

Identification of objectives from society

The societal needs that are reflected in objectives in death education for health professionals are the needs of terminally ill
patients and their families. Because the majority of Americans die in health care institutions, either hospitals or extended care facilities, health care workers are a significant part of the social space of the dying. Therefore, it is important that the professionals develop skills and attitudes with the potential to increase patient and family psychological comfort during terminal illness. Earlier sections of the literature review have established the needs that dying patients and their families have in communicating and interacting with health professionals. The difficulties health professionals have relating to the dying and the bereaved were also discussed.

Identification of objectives from the content area

The work by Bloch (1976) and Dietrich (1980) was used as a basis for identifying content areas in death education for dietitians. Dietrich organized the content in this field of study around the following five dimensions: philosophical, sociological, psychological, medicolegal and health educational. Bloch (1976) suggested the following course objectives for death education courses for medical students: the removal of barriers to approaching the subject of death; an appreciation by the student of feelings about his/her own death; the contribution of death education to the student’s psychological growth; an appreciation of what it is like to be dying; an appreciation of the family's needs; an appreciation of the roles of other personnel; the cultural aspects of death and dying; the ethics of death and dying; and the management of the physical distress of the dying.
Since a curriculum unit for approximately six hours of instruction was planned, the objectives were narrowed to fit the time limitation.

The objectives adapted from Bloch (1976) for inclusion were: an appreciation by the student of his/her own feelings about death, an appreciation of what it is like to be dying, an appreciation of the family's needs; and the psychological theories explaining the grieving process. Based on the work of Shanfield (1981) and Muldary (1983) on the grief reaction of health professionals to the loss of their patients and the importance of prevention of burnout in the health professions, an additional objective was added on developing coping strategies to prevent burnout from working with the seriously/terminally ill. These objectives are from the sociological and psychological dimensions of death education as described by Dietrich (1980).

Selection of learning experiences for the curriculum unit

The unit was designed to have an impact on students' level of knowledge, attitudes, and behavioral performance in the clinical setting. A variety of learning activities were planned to involve the students in the subject from a variety of perspectives.

Lecture/discussion materials were used to present the psychological theories concerning the grief process. Transparencies for overhead projection on the theories explaining the grief process were prepared. Discussion questions for use in small groups were formulated to help students focus on their own feelings during previous experiences of loss. The unit outline is included in Appendix A.
To address student questions about the professional role of the dietitian with terminally ill patients, a 20-minute audiotape was prepared by a registered dietitian (the researcher). The tape included recollections of personal feelings and patient conversations. The tape attempts to be realistic and includes positive and negative feelings about working with the terminally ill, and examples of success and failure in communicating with them.

A film, "Peggy's Final Victory", was made to address the objectives of developing an appreciation of what it is like for the patient to be dying and a sensitivity toward the needs of the family. The main focus of the film was on communication patterns among the patient, family members and various helping professionals. A content specialist in family relations and death and dying helped in the design and editing of the film.

**Evaluation strategies**

Evaluation strategies were developed to see if the objectives for the unit were realized. The objectives involved cognition, attitude development and counseling behaviors. Therefore, evaluation instruments were adopted, adapted, and developed to measure attainment of knowledge, attitude changes, and performance evaluation of counseling behaviors. The individual measures are described in the next section of this chapter.
Instrumentation

Knowledge

An eight-item achievement test was prepared based on the content outlined in the lecture portion of the curriculum unit. The test did not refer to any material presented in the audio-visual components of the unit. The test items were reviewed for content appropriateness by an expert faculty judge and for content validity by another professor with specialty expertise in death education. The test was administered to 37 students in the course, Death as a Part of Living. Because many of the students scored so well on the test, the statistical procedures to determine item analysis and reliability were not meaningful. However, the students reported that the items were appropriate. The achievement test is included in Appendix B.

Attitudes

The Attitude Questionnaire was designed to elicit students' feelings about personal fear of death, fear of interacting with the dying, anxieties about their ability to work professionally with the seriously/terminally ill, and their feelings about the curriculum unit on death and dying. The questionnaire contained 18 items and each item was rated on a 5-point Likert-type scale as a single numerical point between Strongly Disagree (1) and Strongly Agree (5). The sections of the questionnaire dealing with the specific death fears are described separately.
Death fear In an earlier chapter, pertinent research on the measurement of death fear or anxiety was reviewed. In an effort to control the number of items in the questionnaire, the single statement, "I am afraid of death," was rated by students to assess the level of death fear. Using the single item method was suggested by the work of Holmes and Anderson (1980) with undergraduate psychology students, they found a significant relationship between the single-item self-report of death fear and three other research validated death fear scales. The fear of death item is statement 8 on the Attitude Questionnaire in Appendix C.

Fear of interacting with the dying Another dimension of death fear that was important to measure in students in a health care profession was the fear of interacting with the dying. A scale to measure this fear was developed by Nelson and Nelson (1975). In later work by Nelson (1978), the factor relating to the fear of interacting with the dying was a subset of the more generalized reluctance to confront death or disengagement from the death process. This scale consists of 7 items with five Likert-type response choices for each statement. Internal consistency reliability of the scale was established by Nelson (1978) with alpha = .71. In a predictive validity study with this scale, Nelson (1978) found that students who planned careers in medicine, psychiatry, nursing, dentistry and veterinary medicine had lower scores on the death avoidance and disengagement scale than students with non-health care career plans. The disengagement from
death scale items are statements 1-7 on the Attitude Questionnaire in Appendix C.

**Dietetic student attitudes** Since beginning dietetic students have not been exposed to literature concerning the role of the dietitian in working with seriously/terminally ill patients and have not seen dietitians acting as role models in this area when they begin their clinical work, the researcher devised several statements that explored the students' attitudes toward this aspect of the clinical dietitian's role. Six statements were constructed to be rated on the same five point Likert-type scale and treated as non-additive items. These items were reviewed by two faculty experts.

The entire Attitude Questionnaire was administered to a pilot group of 12 dietetic interns. Comments from the faculty and interns about appropriateness and readability were used in revising the statements for the research sample. These items about the dietitian working with the dying are Items 9-14 on the Attitude Questionnaire in Appendix C.

The posttest Attitude Questionnaire contained the same first 14 items as the pretest. Four additional Likert-scaled items were included to measure attitudes about working with the dying to be scored after hearing the audiotape and viewing the film. The students were asked to respond to two short-answer essay questions about their feelings about the film and about the curriculum unit. The students were also asked to respond in the affirmative or negative to these two questions: "Did you feel that watching the film had a positive impact on you?" and "Do you
feel that this unit has made you feel more comfortable about working with the seriously ill?". These posttest only attitude items are numbered 15-18 and the free response questions are items 19-20 on the Attitude Questionnaire in Appendix C.

**Personality traits**

Because results reported in the literature suggested that high levels of closed-mindedness or dogmatism were negatively related to counseling ability (Mezzano, 1969; Kemp, 1962; and Milliken and Paterson, 1967) and empathy was positively related to establishing helping relationships with clients (Rogers, 1975; Boles, 1976; and Kahn et al., 1979), these two personality attributes were measured in the dietetic students in the study.

**Dogmatism** Rokeach first published his Dogmatism Scale in 1960 and its use has been widely reported in the literature. The studies using this scale that seemed pertinent to this study were cited in the earlier review section. The version of the scale used in this study was Form E, a 40-item instrument where each item was rated on a six-point forced choice scale ranging from +3 (I agree very much) to -3 (I disagree very much). The Dogmatism Score was determined by adding the scores on all items. The reliability coefficients reported by Rokeach (1960, p. 90) ranged from .68 to .93 for a diverse groups of subjects (workers, students and war veterans) in the United States and Great Britain. Validation studies were reported for high and low dogmatic groups in relation to their beliefs on religion and politics (Rokeach, 1960, p. 101-108).
Empathy

Trait empathy was measured with Hogan's Empathy Scale. This scale, as originally described by Hogan (1969), consisted of 64 true-false items taken from three widely used personality inventories: the Minnesota Multiphasic Personality Inventory, the California Assessment and Psychological Inventory and the Institute of Personality Research. Adequate reliability and validity of the Empathy Scale have been established (Hogan, 1969; Grief and Hogan, 1973). Because of time constraints for the testing of students in this study, a 39-item shorter version of the scale was administered. A reliability coefficient of .90 was reported when results from the short form were compared with the long form of the scale (R. Hogan, College of Education, University of Tulsa, personal communication, October 26, 1982).

Demographic data

Before the study began, each student filled out a questionnaire (Appendix D) that requested demographic data. The information collected included the following: number of siblings, birth order, size of community, religious preference, past experiences with the death of family and friends, the reason for choosing dietetics as a career and the type of job preferred after graduation.

Clinical performance

The clinical performance of the dietetics students was evaluated before and after the curriculum treatment by direct observation of the student obtaining a diet history from a patient. The usual stages of
the interview were the relationship establishing, the problem solving, and the closing phase. Nine statements were constructed that defined empathic behaviors during the interview process. A five point rating scale was constructed with descriptive modifiers for points one, three, and five for each item. The preliminary instrument was reviewed by an expert panel of eight judges who were dietetic educators from two universities for appropriateness of the defined competencies and the descriptive behaviors. A copy of the Clinical Evaluation Scale is included in Appendix E.

The clinical performance of the students was judged by nine registered dietitian educators. Training in the use of the Performance Evaluation Form was conducted to assure consistency in the use of the instrument by all raters. The first step was to provide written instructions for the use of the form to all programs. Each rater tried-out the form by evaluating a registered or student dietitian not included in the study sample. Questions from the raters after this initial trial were referred to the researcher and answered.

The next step was to establish an acceptable level of inter-rater reliability in use of the instrument. A copy of a videotaped simulation of a dietitian interviewing a client to obtain a diet history was sent to each program. Each rater viewed the videotape and scored the performance using the form. Inter-rater reliability was estimated at 0.8 for the nine-item performance scale using the formula of Hoyt and Stunkard (1952).
Selection of the Sample

The researcher was associated with a Coordinated Undergraduate Program (CUP), which is a university-based educational route for becoming a registered dietitian. These programs, designed for the junior and senior years, couple clinical experience with academic instruction. The Directory of Accredited and Approved Educational Programs of The American Dietetic Association was used to locate similar programs within the mid-section of the country. Two other programs were located who were willing to participate in the study. The three programs shared the following characteristics:

1. the same specialization of general dietetics which prepares students for positions in administrative, clinical, or community settings
2. full accreditation by the Commission on Accreditation of the American Dietetic Association, which is recognized by the U.S. Department of Education as the accrediting agency for dietetic internships and CUPs
3. the same cumulative grade point average (2.5 on a 4.0 scale) for admission
4. no previous instruction on death and dying
5. similar amounts of clinical experience during the junior year prior to the start of the research project.

Cooperation of the three program directors was solicited in telephone conversation and confirmed in writing. The terms of agreement included the following:
1. a single instructor was designated to teach the unit.
2. all materials for instruction and data collection were provided and used without modification.
3. the unit was scheduled during a one-week time period.
4. the pre- and posttests would be given within 48-hours of the start and completion of the unit.
5. student clinical performance would be evaluated within a three-week period before and after presentation of the unit.

Data Collection

Data were collected in all three programs during the same three month period. Informed consent forms (Appendix F) were signed by all students. The performance evaluations of the students interacting with the patients in the clinical setting were made during regularly scheduled clinical experiences in community hospitals. During the class period before the first section of the curriculum unit was begun, the students were asked to fill out the demographic data questionnaire, Rokeach's Dogmatism Scale, Hogan's Empathy Scale, the Attitude Rating Scale, and the Achievement test. After the last section of the curriculum unit was taught, all instruments, with the exception of the demographic data questionnaire, were administered as posttests.

Frequent telephone calls were made by the researcher to the outlying programs in the study to ensure that the treatment and evaluations were implemented in the same manner in each of the programs and to answer any questions during the data collection period.
All instruments and answer sheets were coded by the researcher with a student identification number and supplied to the program directors in the two geographically removed schools. The instruments were all returned to the researcher for data coding and processing.

Research Design

Since the goal of the project was to design and implement a curricular offering in death and dying for dietetics students, it was necessary to compensate for small numbers of students, who were already pre-selected into dietetics education programs, in determining the research design. The design employed was a one-group, pretest-posttest design with two replications of the entire design.

Analysis of Data

This section describes the analysis of the results of the instruments administered to the students, and the statistical methods used in the project.

The previous section on selection of programs for the study outlines the similarities among the three programs. However, to determine whether data from the three programs could be pooled, other analyses were performed. On demographic variables, chi-square analyses revealed no differences in age, birth order, size of community, religious preference, degree of religious conviction, reason for choosing dietetics as a profession, job preference, GPA, previous death
education, and previous experience with death. There was a significant
difference among programs in the number of siblings of the students.

Scores of students on research instruments were examined by
analysis of variance. There were no differences by program in responses
to the achievement test, Hogan Empathy Scale, Rokeach Dogmatism Scale,
fear of death, disengagement from death, or attitudes concerning the
role of dietitians working with seriously ill patients. There was a
significant difference in scores on the performance evaluation scale.

Based on the results of the chi-square analysis, the analysis of
variance, and the review of the program, the data were pooled for all
but one analysis. Comparisons of pre- and post-scores on performance
evaluation were made for each program.

Individual students were the unit of analysis. Instruction in
the classroom was somewhat individualized and the clinical experience
was entirely individualized for the students.

Analysis of the instruments

The raw data from all of the instruments: demographic data
questionnaire, attitude questionnaire, Rokeach Dogmatism Scale, Hogan
Empathy Scale, Knowledge Achievement Test, and the Performance
Evaluation Form were coded to computerize the raw data files. Scale
scores were computed for the individual attitude scales, Rokeach
Dogmatism Scale and the Hogan Empathy Scale. Since all items on the
Performance Evaluation Form could not be scored in all cases, an average
performance score was computed for each student.
Statistical methods

All statistical procedures in the study were performed using the Statistical Package for the Social Sciences (SPSS-X version). Descriptive statistical analyses were performed on the demographic and biographic data. Data were grouped for the variables age, number of siblings, previous death education, and birth order to be able to perform meaningful chi-square tests. Analysis of variance was performed on the scores by program for each of the instruments. Paired t-test comparisons were made for the pre- and posttest scores on each of the instruments.

For the items on dietetic student attitudes prepared for this project, the reliability program was used to calculate Cronbach's alpha for the items. Intercorrelations were determined on a 33 x 33 matrix of demographic, biographic, knowledge, attitude and performance scores.

The level of significance selected for testing was the .05 level. However, because this was an exploratory study, intercorrelations at the .10 level are discussed as trends in patterns of relationships for certain variables.
FINDINGS AND DISCUSSION

The main purposes of the study were to develop a curriculum unit on death and dying and to test its efficacy in meeting the needs of dietetic students who were beginning their clinical experience of working with patients, some of whom were seriously or terminally ill. The first section of this chapter describes the biographic and demographic characteristics of the dietetic students studied. The next section presents findings related to the effect of the curriculum unit on knowledge achievement, attitudes, and clinical performance. The last section presents excerpts from the subjective data collected from students and instructors on the curriculum unit as a whole and to the film that was produced for use in this unit.

Results from Administration of Instruments

**Characteristics of dietetic students**

The subjects participating in the study were 47 students in the second half of the junior year in three Coordinated Undergraduate Programs in Dietetics located in three different universities in the mid-section of the country. There were 16 students in Program A; 11 in Program B; and 20 in Program C. All of the students were female, and the average age was 22.4 years. Thirty-four of the students were in the younger age group of 20-22 years, and 13 were in the older group from 23 through 30 years of age. There were no only children in the group and the mean number of siblings was 2.8 (range 1-6). Data were collected on
the birth order of the students. There were 12 first-born children, 11 second-born, and 24 were later-born (third through seventh).

The students were asked to indicate the size of the community in which they were raised. Results indicated that 11 had come from communities of under 5,000 population; 12 from communities of 5-20,000; 14 from small cities of 20-100,000; and 10 from cities of over 100,000 population.

There was little racial variety represented in the sample. One student was Hispanic-American and the other 46 were Caucasian. There were no members of the Black, Oriental, or Native American racial groups.

All students indicated a religious preference. One student was Jewish; 17 were Roman Catholic; 27 were Protestant; and two indicated the category 'Other' and specified 'Christian' in the explanatory blank that was provided. None of the students chose the category 'No Religious Preference'. Students were asked to indicate the extent of their religious conviction. Twelve described themselves as very religious; 31 as somewhat religious; and four as not religious.

Several questions related to previous experiences with death and death education were included. Information was obtained on their first encounter with death, losses within their immediate families and of close friends. They were also asked if the deaths of family members and friends had occurred within the past five years. The responses to these questions are summarized in Table 1. For 27 students their first
Table 1: Previous experiences of dietetic students with death

A. First personal involvement with death

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Grandparent/great grandparent</td>
<td>27</td>
<td>57.4</td>
</tr>
<tr>
<td>2. Parent</td>
<td>3</td>
<td>6.4</td>
</tr>
<tr>
<td>3. Sibling</td>
<td>2</td>
<td>4.3</td>
</tr>
<tr>
<td>4. Friend</td>
<td>3</td>
<td>6.4</td>
</tr>
<tr>
<td>5. Pet</td>
<td>3</td>
<td>6.4</td>
</tr>
<tr>
<td>Total</td>
<td>47</td>
<td>100.0</td>
</tr>
</tbody>
</table>

B. Death in immediate family

1. Has a death occurred in your immediate family?

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>37</td>
<td>78.7</td>
</tr>
<tr>
<td>No</td>
<td>10</td>
<td>21.3</td>
</tr>
<tr>
<td>Total</td>
<td>47</td>
<td>100.0</td>
</tr>
</tbody>
</table>

2. Which family member died?

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Grandparent</td>
<td>29</td>
<td>61.7</td>
</tr>
<tr>
<td>Father</td>
<td>3</td>
<td>6.4</td>
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<tr>
<td>Mother</td>
<td>2</td>
<td>4.3</td>
</tr>
<tr>
<td>Sibling</td>
<td>3</td>
<td>6.4</td>
</tr>
<tr>
<td>None</td>
<td>10</td>
<td>21.3</td>
</tr>
<tr>
<td>Total</td>
<td>47</td>
<td>100.0</td>
</tr>
</tbody>
</table>

3. Did this death occur within the last five years?

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>22</td>
<td>46.8</td>
</tr>
<tr>
<td>No</td>
<td>25</td>
<td>53.2</td>
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<tr>
<td>Total</td>
<td>47</td>
<td>100.0</td>
</tr>
</tbody>
</table>

C. Death of a friend

1. Have you experienced the death of a close friend?

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>14</td>
<td>29.8</td>
</tr>
<tr>
<td>No</td>
<td>33</td>
<td>70.2</td>
</tr>
<tr>
<td>Total</td>
<td>47</td>
<td>100.0</td>
</tr>
</tbody>
</table>

2. Did this death occur within the last five years?

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>10</td>
<td>21.3</td>
</tr>
<tr>
<td>No</td>
<td>37</td>
<td>78.7</td>
</tr>
<tr>
<td>Total</td>
<td>47</td>
<td>100.0</td>
</tr>
</tbody>
</table>
encounter with death was the loss of a grandparent or great-grandparent. The rest of the students indicated a variety of answers including parents, siblings, other family members, friends and pets. More than three-fourths of the students had experienced a death within their immediate family (grandparent, parent, sibling), and nearly half of the students had experienced this loss within the past five years (Table 1). Fourteen students indicated that they had lost a close personal friend, and 10 had experienced this loss within the past five years (Table 1). Nine students stated they had not experienced a death within their immediate family or of a close friend. Six of the students had participated previously in a course or workshop on death and dying.

Students were asked to identify the main reason they chose dietetics as a career by selecting one of these five phrases: interested in a health care profession, interested in foods and nutrition, opportunity to help people, availability of jobs, and interested in managing a food service system. A summary of these responses is provided in Table 2. The three choices which received most of the responses were interest in a health care profession, foods and nutrition, and helping people. When asked to select their job preference after graduation, two-thirds of the students selected a position in clinical dietetics either in a medical facility or in outpatient counseling. Four students were interested in administrative dietetics, three were interested in teaching, and nine were still undecided (Table 2).
Table 2. Choice of profession and future job preference of dietetic students

A. Main reason for choosing to study dietetics

<table>
<thead>
<tr>
<th>Reason</th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Interest in a health care profession</td>
<td>18</td>
<td>38.3</td>
</tr>
<tr>
<td>Interest in foods and nutrition</td>
<td>14</td>
<td>29.8</td>
</tr>
<tr>
<td>Opportunity to help people</td>
<td>12</td>
<td>25.5</td>
</tr>
<tr>
<td>Availability of jobs</td>
<td>2</td>
<td>4.3</td>
</tr>
<tr>
<td>Interest in managing a food service system</td>
<td>1</td>
<td>2.1</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>47</strong></td>
<td><strong>100.0</strong></td>
</tr>
</tbody>
</table>

B. Job preference in dietetics

<table>
<thead>
<tr>
<th>Preference</th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clinical dietitian — medical facility</td>
<td>17</td>
<td>36.2</td>
</tr>
<tr>
<td>Out-patient counseling or private practice</td>
<td>14</td>
<td>29.8</td>
</tr>
<tr>
<td>Administrative dietitian</td>
<td>4</td>
<td>8.5</td>
</tr>
<tr>
<td>Teaching</td>
<td>3</td>
<td>6.4</td>
</tr>
<tr>
<td>Undecided</td>
<td>9</td>
<td>19.1</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>47</strong></td>
<td><strong>100.0</strong></td>
</tr>
</tbody>
</table>
All three programs required a cumulative grade point average (GPA) of 2.5 on a 4.0 scale for admission to the professional dietetics program. An analysis of variance of the GPA by university was performed and a statistically significant F ratio = 3.39 (p <.05) was obtained. Since there were unequal numbers of students in the three programs, the Scheffe' method or post-hoc, pair-wise comparisons was performed and no two groups were found to be significantly different from each other.

Chi-square analyses were performed to determine if there were any differences by university in the distribution of responses for the following demographic variables: age, number of siblings, size of community, religious affiliation, degree of religious conviction, death in the immediate family, death in the family within five years, death of a friend, death of a friend within five years, first death experience, reason for choosing dietetics as a profession and job preference in the field of dietetics. The only statistically significant finding in the analysis of all these variables was a difference in the distribution in the number of siblings for the group of students at one university. The results of the chi-square procedure for this variable was 6.80, (p<.05). The determination was made that this difference in the number of siblings did not affect treating the study sample as a homogeneous group.

Knowledge achievement test

An eight-item achievement test was administered before and after the teaching of the curriculum unit. The items included psychological
and sociological understanding of death and dying, but did not include the theory of counseling techniques. The mean score for the pretest was 5.5 and for the posttest, 6.6 (Table 3). The t-test statistic calculated for the paired observations indicated a significant difference in the pre- and posttest scores.

**Personality trait measures**

**Hogan Empathy Scale** A shortened form of Hogan's Empathy Scale, consisting of 39 true and false questions, was administered before and after the curriculum unit. When an analysis of variance procedure was performed on the pretest scores separated by university program, a significant F ratio was obtained (Table 4). A Scheffe' post-hoc, pairwise comparison indicated a significant difference between Program B (n=11) and Program C (n=20). Because the number of students was very small in Program B and the program differences were not observed in the empathy posttest scores, the decision was made to group the pre- and posttest scores for further statistical analysis. The mean score for the pretest was 23.2 (range 15-33) and the posttest, 22.2 (range 13-32). Even this small decrease in scores from the pretest to the posttest was found to be statistically significant (Table 3).

**Rokeach Dogmatism Scale** When a comparison was made for the mean scores for the pre- and posttest administration of the dogmatism scale, no significant differences were found (Table 3). Since the measurement of this personality trait remained stable over the short time of this research project, the results from the pretest administration were used
Table 3. Summary of paired $t$-tests on pre- and posttest measures

<table>
<thead>
<tr>
<th></th>
<th>Pretest $M$</th>
<th>Posttest $M$</th>
<th>$t$</th>
</tr>
</thead>
<tbody>
<tr>
<td>Knowledge $(n = 47)$</td>
<td>5.5</td>
<td>6.6</td>
<td>-5.72***</td>
</tr>
<tr>
<td>Empathy $(n = 47)$</td>
<td>23.2</td>
<td>22.2</td>
<td>2.93**</td>
</tr>
<tr>
<td>Dogmatism $(n = 47)$</td>
<td>135.2</td>
<td>137.1</td>
<td>-1.03</td>
</tr>
<tr>
<td>Fear of death $(n = 47)$</td>
<td>3.0</td>
<td>2.9</td>
<td>0.73</td>
</tr>
<tr>
<td>Disengagement from death $(n = 47)$</td>
<td>23.1</td>
<td>23.5</td>
<td>0.74</td>
</tr>
<tr>
<td>Dietetic student attitude $(n = 47)$</td>
<td>14.4</td>
<td>14.4</td>
<td>0.07</td>
</tr>
</tbody>
</table>

Performance evaluation

<table>
<thead>
<tr>
<th></th>
<th>Pretest $M$</th>
<th>Posttest $M$</th>
<th>$t$</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program A $(n = 16)$</td>
<td>3.2</td>
<td>3.7</td>
<td>-5.77***</td>
</tr>
<tr>
<td>Program B $(n = 11)$</td>
<td>3.7</td>
<td>4.1</td>
<td>-1.70</td>
</tr>
<tr>
<td>Program C $(n = 20)$</td>
<td>3.6</td>
<td>4.4</td>
<td>-6.12***</td>
</tr>
</tbody>
</table>

** = $p < .01$.

*** = $p < .001$. 
in the intercorrelational studies reported later. The mean score for Form E of Rokeach's Dogmatism Scale was 135.2.

**Student attitudes toward death and dying**

**Fear of death** The level of death fear was estimated in this study by asking students to indicate on a 5-point Likert-type scale their response to the single statement, "I am afraid of death". The mean rating for this item was 3.0 before the unit and 3.1 afterwards. Scores on both administrations of the instrument ranged from 1 to 5. Further analysis did not identify any statistical difference in these scores.

**Disengagement from death scale** Another dimension of death anxiety that was measured was the desire to disengage oneself from death. The mean score for students on Nelson's Disengagement from Death Scale was 13.4 (range 7-31) on both the pre- and posttest administrations. The maximum score on the instrument is 35, which indicates a high level of fear of interacting with the dying.

**Dietetic student attitudes** Items 9 through 14 on the attitude scale (Appendix C) were added to measure student perceptions of the role of the dietitian in working with terminally ill patients and their feelings about this part of their professional preparation. Reliability analysis of these six items indicated that when items 9, 10, 13, and 14 were combined into a scale, an alpha coefficient of .68 was obtained for the pretest scores, and .71 on the posttest. Again there was no significant change in this attitude scale score when paired comparisons
were made (Table 3). The mean score for both the pre- and posttest was 14.4. The maximum score for this four-item scale is 20, and the range of student scores was 9 to 20.

Clinical performance evaluation

Students were rated by trained clinical evaluators on their empathic responses to patients in interviewing/counseling sessions before and after the curriculum unit. There was an improvement in the scores after the unit for 41 of the 47 students. Paired t-tests indicated a significant difference between the mean pre- and posttest scores for Programs A and C, but not for B (Table 3). The mean pre-curriculum unit performance evaluation score for Program A was 3.2; for Program B, 3.7; and for Program C was 3.6. The post-curriculum scores were 3.7 Program A; 4.1 for Program B; and 4.4 for Program C (Table 4).

In order to assess the effect of the pretest performance evaluation on the posttest performance evaluation score, a multiple regression procedure was used to examine the differences in the slope and intercept relationships between the pre- and posttest scores at the three universities. Dummy Variables A and B were constructed for intercept differences and Dummy Variables C and D for slope differences. In a stepwise regression, the partial regression coefficients for the pretest, Dummy Variable A and Dummy Variable C were significant. This indicated that Program A had a different mean and a different slope than Program C. Program B and Program C were not different for either mean or slope. The multiple correlation coefficient squared for the three significant variables was .40.
Table 4. Analysis of variance of mean scores on selected by dietetic program

<table>
<thead>
<tr>
<th></th>
<th>Pretest</th>
<th>Posttest</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>M (F)</td>
<td>M (F)</td>
</tr>
<tr>
<td>Knowledge</td>
<td></td>
<td></td>
</tr>
<tr>
<td>A</td>
<td>6.0 (5.3)</td>
<td>6.6 (7.4)</td>
</tr>
<tr>
<td>B</td>
<td>5.3 (5.3)</td>
<td>6.7 (7.4)</td>
</tr>
<tr>
<td>C</td>
<td>20</td>
<td>20</td>
</tr>
<tr>
<td>Empathy</td>
<td>3.85* (1.48*)</td>
<td></td>
</tr>
<tr>
<td>A</td>
<td>23.0 (21.9)</td>
<td></td>
</tr>
<tr>
<td>B</td>
<td>26.1 (24.4)</td>
<td></td>
</tr>
<tr>
<td>C</td>
<td>21.7 (21.2)</td>
<td></td>
</tr>
<tr>
<td>Dogmatism</td>
<td>0.27 (0.57)</td>
<td></td>
</tr>
<tr>
<td>A</td>
<td>131.9 (133.6)</td>
<td></td>
</tr>
<tr>
<td>B</td>
<td>136.1 (133.3)</td>
<td></td>
</tr>
<tr>
<td>C</td>
<td>137.4 (142.1)</td>
<td></td>
</tr>
<tr>
<td>Death fear</td>
<td>1.21 (0.22)</td>
<td></td>
</tr>
<tr>
<td>A</td>
<td>2.6 (2.9)</td>
<td></td>
</tr>
<tr>
<td>B</td>
<td>2.9 (3.0)</td>
<td></td>
</tr>
<tr>
<td>C</td>
<td>3.3 (3.2)</td>
<td></td>
</tr>
<tr>
<td>Disengagement from death</td>
<td>0.90 (0.41)</td>
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</tr>
<tr>
<td>A</td>
<td>27.7 (28.0)</td>
<td></td>
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<td>B</td>
<td>28.7 (29.5)</td>
<td></td>
</tr>
<tr>
<td>C</td>
<td>29.2 (28.6)</td>
<td></td>
</tr>
<tr>
<td>Dietetic student attitude</td>
<td>0.27 (1.12)</td>
<td></td>
</tr>
<tr>
<td>A</td>
<td>14.2 (14.0)</td>
<td></td>
</tr>
<tr>
<td>B</td>
<td>14.9 (15.4)</td>
<td></td>
</tr>
<tr>
<td>C</td>
<td>14.4 (14.3)</td>
<td></td>
</tr>
<tr>
<td>Performance evaluation</td>
<td>5.51** (13.71***)</td>
<td></td>
</tr>
<tr>
<td>A</td>
<td>3.2 (3.7)</td>
<td></td>
</tr>
<tr>
<td>B</td>
<td>3.7 (4.1)</td>
<td></td>
</tr>
<tr>
<td>C</td>
<td>3.6 (4.4)</td>
<td></td>
</tr>
</tbody>
</table>

* = p < .05.
*** = p < .001.
Relationships among selected variables

Intercorrelations among ten selected variables are shown in Table 5. The variables included demographic and biographic measures, scores on the Rokeach Dogmatism Scale, and the following variables measured after the presentation of the curriculum unit: performance evaluation of empathic response to patients, Hogan's Empathy Scale score, Nelson's Disengagement from Death score, Fear of Death score, and the Dietetic Student Attitude Scale score. The results of these selected intercorrelations are summarized in Table 5.

There was a significant positive relationship (.36, p<.05) between the score on Hogan's Empathy Scale and the score on the Dietetic Student Attitude Scale. A low positive correlation (.24, p<.10) was also found between the empathy scale scores and the age of the students. A significant negative relationship was identified between scores on Hogan's Empathy Scale and the Rokeach Dogmatism Scale (-.34, p<.05). A low negative relationship (-.25, p<.10) was found between this measure of trait empathy and the fear of death.

Results from the administration of the Rokeach Dogmatism scale were positively related to scores on the Disengagement from Death Scale (.30, p<.05). A negative relationship of lower significance was also found between scores on the Dogmatism Scale and on the Dietetic Student Attitude Scale (-.26, p<.10).

Scores on the Disengagement from Death Scale were positively correlated with scores on the Fear of Death Scale (.43, p<.05).
<table>
<thead>
<tr>
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<th>II</th>
<th>III</th>
<th>IV</th>
<th>V</th>
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<th>VII</th>
<th>VIII</th>
<th>IX</th>
<th>X</th>
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<tr>
<td>Dogmatism</td>
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<td>Disengagement from death</td>
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<td>.30*</td>
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<td></td>
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<tr>
<td>Fear of death</td>
<td>-.25*</td>
<td>.18</td>
<td>.43*</td>
<td></td>
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<td>V</td>
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<tr>
<td>Dietetic student attitude</td>
<td>.36*</td>
<td>-.26a</td>
<td>-.54***</td>
<td>-.45***</td>
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<tr>
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<tr>
<td>Performance evaluation</td>
<td>.11</td>
<td>.01</td>
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*a = p < .10.

* = p < .05.

** = p < .01.

*** = p < .001.
Significant negative correlations were found between scores on the Disengagement from Death Scale and measurements of the Dietetic Student Attitude Scale (-.54, p<.001), belief in life after death (-.39, p<.01), and the recent loss of a friend (-.40, p<.01). A negative relationship of less significance was also found between this measure of death anxiety and the degree of religious conviction of the students (-.24, p<.10).

Significant negative relationships were located between the measure of the Fear of Death and the scores on the Dietetic Student Attitude Scale (-.45, p<.001) and the degree of religious conviction (-.44, p<.01).

There was a significant positive relationship between scores on the Dietetic Student Attitude Scale and the degree of religious conviction (.31, p<.05), and the recent death of a friend (.34, p<.05). A positive relationship of less significance was found between scores on this attitude scale and performance evaluation (.25, p<.10) and belief in life after death (.25, p<.10).

Empathic response scores from the evaluation of clinical performance were positively related at a lower level of significance with scores on the Dietetic Student Attitude Scale (.25, p<.10). No further significant relationships were located between clinical performance ratings and any of the variables measured in this study.

There was little relationship between the age of the students and any of the variables. A positive relationship of lower significance was found between age and scores on the Hogan Empathy Scale (.24, p<.10).
There was a significant positive relationship between the degree of religious conviction and scores on the Dietetic Student Attitude Scale (.31, p<.05) and belief in life after death (.33, p<.05). A significant negative relationship was found between religious conviction and scores for the Fear of Death (-.44, p<.01). A similar relationship, but at a lower level of significance, was found between the degree of religious conviction and scores on the Disengagement from Death Scale (-.24, p<.10).

Belief in life after death was positively related to the degree of religious conviction (.33, p<.05); and negatively to Disengagement from Death Fear (-.39, p<.01). A positive relationship at a lower level of significance was found between belief in an afterlife and the Dietetic Student Attitude Scale (.25, p<.10).

The experience of the death of a close friend within the past five years was related significantly to scores on the Dietetic Student Attitude Scale (.34, p<.05). A significant negative relationship was found between the death of a friend and Disengagement from Death Fear (-.40, p<.01).

Descriptive Evaluation of the Curriculum Unit

Student evaluation

As part of the post-curriculum evaluation, the students were asked their opinions of the unit as a whole, and particularly the film that was developed for the unit. The first question was, "Did you feel that
watching the film had a positive impact on you?" All 47 students responded in the affirmative to this question. The students were asked to describe their feelings about the film. The following are some examples of student responses:

"Makes me realize how important the response of health professionals is to the dying patient."

"Peg's will to succeed has changed many of my views on dying."

"Peggy seemed very strong and independent. I would have liked to meet her."

"The film gave me insight that I did not have before."

The students were also asked whether or not the unit made them feel more comfortable about working with the seriously ill. A majority of the group (43) responded positively; and four, negatively. The students were again asked to share their feelings, and the following are examples of their responses:

"This unit has helped me understand that death is a subject that can be talked about and a subject that I will have to deal with. This realization alone is a step for me."

"Not once before this unit did I ever realize that I would be working with seriously ill and dying patients. I guess I thought all my patients would be well. That's very ironic, when you think about it, because people who are well don't go to the hospital."

"The discussions helped me to get some of my feelings out into the open. I feel relieved that it's OK to cry."
The responses of students indicated that this unit involved them at a personal level. For some, it evoked experiences from the past and for others it identified fears about the future. Only one student did not respond to the open-ended questions asking for responses about their feelings.

Instructor evaluations

Instructor evaluations of the unit and film were obtained from the person designated to teach the lecture and discussion sessions in each of the three programs. The amount of time that was spent in conducting the curriculum unit in the three programs were as follows: Program A, 195 minutes; Program B, 200 minutes; and Program C, 210 minutes.

The instructors indicated that the lesson plans were understandable and easy to utilize in the individual program situations. One instructor requested that more information on the theoretical basis for the psychological understanding of the grief process be included.

The instructors in Programs A and B expressed the opinion that the audiotape of the author's experiences with several dying patients is a unique resource in dietetic education and was helpful to the students in considering their role as a professional with seriously ill clients. These instructors also indicated that the film, "Peggy's Final Victory", was a sensitive, professional quality film. All instructors agreed that the film was helpful for students in assisting them to articulate their feelings about handling death in their personal lives and with patients.
As a further indication of the usability of the death and dying unit, personal communications from the directors of Programs A and B (B. Gillham, Department of Home Economics, University of Texas at Austin, personal communication, October 16, 1984; V. R. Burkholder, Food and Nutrition Department, North Dakota State University, personal communication, October 18, 1984) have indicated that the unit was adopted for inclusion in their curricula after the research project. The use of the unit has also continued at Program C where the author teaches.

Discussion of Results

Knowledge achievement test

There was a significant improvement in test scores on the eight-item achievement test when scores on the posttest were compared with those from the pretest. No significant relationships were located between the achievement test and any of the other evaluation measures that were used in the study. As pointed out previously, the test questions were related to the psychological and sociological understanding of the grief process and issues related to death and dying. If the questions had included the counseling process, perhaps a greater relationship might have been observed between this instrument and counseling performance.
Personality trait measures

Hogan Empathy Scale In a study of a large number of medical students (Kupfer et al., 1978), the average score on the Hogan Empathy Scale was 30.4 which is considerably higher than the average empathy score of 22.2 found in this study of dietetic students. A higher score on this instrument indicates a higher degree of empathy as a personality trait.

Other studies used longer versions of the Hogan Empathy Scale involving either 47 or 64 items. To compare the results from this study with the results from longer versions, the scores were converted into percentages for a rough comparison. The dietetic students in this study had an average percentage of 57% on this instrument. Freshman medical students (n=389) surveyed by Streit-Forest (1982) averaged 62% on the Empathy Scale. Diseker and Michielutte (1981) found that a group (n=93) of second year medical students scored average percentage of 65%. This is similar to the original validation data collected by Hogan (1969). Medical students (n=66) were found to have empathy scores of 66%; and female college students (n=93), 64%. MacDonald (1977) used the scale to evaluate a small group (n=15) of female nursing students, and their average score was 60%, which is similar to the scores obtained in this study. A comparison of these results indicate that the dietetic students in this study have somewhat lower average empathy scores than groups of medical, nursing and female college students for whom data are available.
In this study, a small but significant decrease in the Empathy Scale scores was found after the curriculum unit. Diseker and Michielutte (1981) found a similar small but statistically significant decrease when scores of medical students were compared at the beginning of the second year with their scores at the time of graduation. Because the change was small, it is difficult to evaluate whether the change indicates that the personality trait of empathy as measured by Hogan's Scale is not stable over time or whether this decrease in empathy score was due to the experience of participating in the curriculum unit.

In this study older students had somewhat higher empathy scores than younger students. However, the range of ages was from 20-30, and the relationship was significant (p <.10). It is difficult to generalize from this finding since Rickert (1981/1982) found that older staff nurses had lower empathy scores, and Radick and Hughes (1981) found a similar relationship with teachers.

**Rokeach Dogmatism Scale**

The other personality trait that was measured in this study was dogmatism, the degree of open- or closed-mindedness, using Rokeach's Scale, Form E. The dietetic students had a mean score of 135.2 with a range of scores from 55-189. Subjects with higher scores have a closed or dogmatic belief system. The Rokeach Dogmatism Scale was used by Webb and Linn (1977) to evaluate open-mindedness in first year medical, nursing and social work students. The average scores for these three groups of students were as follows: medical (n=36), 127.9; nursing (n=29), 120.4; and social work (n=52),
113.1. The scores of dietetic students in this study were higher than the scores for the medical and nursing students and much higher than the social work students.

Relationships among selected variables

The negative relationships between scores on Hogan's Empathy Scale and the Rokeach Dogmatism Scale were similar to the findings of Streit-Forest (1982) in a study of empathy in medical students. She also found that scores on these two instruments were negatively related indicating that the students with high scores for dogmatism have lower empathy trait scores.

In this study, students who indicated a higher degree of religious conviction had significantly lower fear of death scores, lower disengagement from death scores, and were more apt to believe in an afterlife. These results are similar to those Templer (1972) who found lower death anxiety scores for students who were religiously very involved.

Students who had experienced the death of a close friend within the past five years were not more afraid of death than students who had not experienced similar losses, which is similar to the results Lester and Kam (1971). In this study, the students who had experienced a recent loss of a friend had lower disengagement from death scores. This relationship is of interest because the film designed for the curriculum unit presented the experience of a young couple dealing with the illness and death of the wife. The film offers the students a vicarious experience of "friends" in their age group dealing with death.
Scores on the three attitude measures used in this study did not change after the curriculum unit indicating that these attitudes were resistant to change in the short data collection period. Although the attitudes measured were not significantly different after the curriculum unit, the descriptive comments from the students and the instructors indicated that the students felt very personally involved in the unit and verbalized new insights concerning their role as health professionals with terminally ill patients. Although the pre- and post-unit measurements of death fear and fear of interacting with the dying did not show any improvement after the curriculum unit, neither did they indicate that students were more fearful of death or of working with the dying after the instruction.

The Dietetic Student Attitude Scale contained four items that addressed the student dietitians' attitudes toward working with terminally ill patients in a professional role. Students with high scores on this instrument, indicating a positive attitude toward this part of their professional role, had high empathy, low dogmatism, low death fear, and low disengagement from death fear scores. This same group of students also had a tendency to achieve higher scores on the performance evaluation.

Although this study was exploratory and involved a small group of students, a curriculum unit, including a film, was developed that was acceptable to faculty and students alike. Scores on the knowledge achievement test and the performance evaluation were improved after the
curriculum unit. Of the variables measured in the study, only the Dietetic Student Attitude scale showed a trend (p<.10) of relating to performance scores.

Students with high dogmatism scale scores had low empathy scores. The dietetic students were more dogmatic and less empathetic than students in other health professions. Students were slightly less empathetic after the curriculum unit. Older students were slightly more empathetic than younger students.

Students with a higher degree of religious conviction were less afraid of death and interacting with the dying and were more certain of their belief in life after death. Students who had experienced the recent loss of a friend had lower fears of interacting with the dying and were more positive about interacting with terminally ill patients as part of their role as a dietitian.

Although attitude measures employed were not sensitive enough to measure change after the unit, the descriptive data indicated that students felt that the unit and film had a positive impact on their ability to counsel seriously ill patients as a dietitian. The increase in the performance scores after the unit indicates that the students were able to relate more empathically to their patients than they had earlier in the semester.
SUMMARY

Dietetic educators who work with dietetic students in their clinical experiences are concerned with the issue of how to prepare their students to interact effectively with seriously/terminally ill patients.

The ability to relate with empathy to another person is to have the ability to see the world through the other's eyes. If dietitians are able to develop empathetic rapport with their clients, decisions about the provision of appropriate nutritional care and counseling are more likely to fit the client's needs and wishes.

The major focus of this study was to develop a curriculum unit on death and dying for dietetic students. The next step was to incorporate the unit into the beginning professional clinical experiences of dietetic students and to evaluate the impact of the unit on the students' understanding of the grief process; their attitudes to death and working with the dying; and their ability to counsel seriously ill patients.

The subjects for this study were 47 junior students enrolled in Coordinated Undergraduate Programs in dietetics in three universities located in the mid-section of the country. Demographic data were collected for the following variables: age; size of community; degree of religious conviction and certainty of life after death; and previous experiences with death. Data were collected before and after the presentation of the curriculum unit. Instruments were adopted or
developed to assess the following items: knowledge achievement, personality traits of empathy and dogmatism, death fear, fear of interacting with the dying, attitudes toward working with seriously/terminally ill clients as part of the profession role, and clinical performance.

The curriculum unit included materials and instructions to approach the topic of working with seriously/terminally ill patients with a variety of learning activities. Each dietetics program was provided with an outline of lecture material, transparencies for overhead projection, an audiotape of a dietitian's experiences in working with terminally ill patients, and a videotape copy of the film produced for the unit, "Peggy's Final Victory". The film illustrates communication patterns between health professionals and a young couple coping with the terminal illness of the wife.

The following instruments were adapted or developed for evaluating student response to the curriculum unit. The personality traits of empathy and dogmatism were measured using the Hogan Empathy Scale and the Rokeach Dogmatism Scale. To measure the fear of death, the students were asked to rate the following statement on a 5-point Likert-type scale: "I am afraid of death". The Nelson Disengagement from Death Scale was used to measure reluctance to interact with the dying. An eight-item achievement test was developed based on the lecture material on understanding the grief process. The items were judged for appropriateness by faculty judges and death education students. Six
attitude items related to the perception of the dietetic students concerning the role of the dietitian working with terminally ill patients were also rated on the same 5-point Likert-type scale. Reliability analysis of results indicated that when four items were combined into a scale an alpha coefficient of .71 was achieved.

A performance evaluation rating scale was developed for use in this study. Nine descriptive statements were constructed to identify empathic behavior during the interview process. The instrument was reviewed by a panel of expert judges. Inter-rater reliability for the nine raters in the three dietetic programs was estimated at .80.

The average age of the students was 22.4 years. The proportion of students raised in rural and urban communities was nearly equal. There was little racial variety in the sample and almost all of the students classified themselves as Christians. A large proportion of the students indicated that they were very or somewhat religious.

Three-quarters of the students had experienced a death in their families and for half of them this loss had occurred in the past five years. Nearly one-third of the students had lost a friend through death.

There was a significant improvement in the scores on the achievement test which was administered on a pre- and posttest basis. However, the test items included items related to understanding the grief process and did not include items related to effective counseling.
The scores on the Hogan Empathy Scale, which measures trait empathy, were lower for this group of dietetic students than the scores reported for other groups of allied health professionals. A small but significant decrease in scores on this scale was found after the curriculum unit was presented. Older students were slightly more empathic than younger students. It has been previously reported that empathy and dogmatism are inversely related, and that relationship of personality trait scores was also found in this study. Students with higher dogmatism scale scores had lower empathy trait scores. Students were also found to be more dogmatic (as measured by the Rokeach Dogmatism Scale) than the students in other health professions.

The educational intervention did not increase or decrease death fear in the students. Students with a higher degree of religious conviction indicated less death fear on the two measures used in the study.

The loss of a family member did not seem to affect scores on the attitude or behavior measures. However, students who had experienced the recent loss of a friend had lower death fear and more positive attitudes about interacting with terminally ill patients as part of the professional role of a dietitian.

The performance evaluation scores did improve significantly after the unit. However, there were significant relationships between performance scores and the other variables measured were not located, and it was not possible to develop a model to predict the
characteristics of students most likely to empathically counsel seriously ill patients.

The Dietetic Student Attitude scale was used to measure attitudes about working as a dietitian with terminally ill patients. Students with high scores indicating positive attitudes on this scale had high empathy, low dogmatism, low death fear, low disengagement from death fear, and somewhat higher performance evaluation scores.

Although no significant changes were found in any of the attitude scores after the unit, the curriculum unit and the film were very well received by the students and the faculty members involved. A large majority of the students indicated that the unit made them feel more comfortable about dealing with the seriously ill.

Attitudes about death fear, interacting with the dying and working as a dietitian with terminally ill patients were not changes after the curriculum unit. Although the scores on the attitude scales did not improve, results from the descriptive data were positive about the importance of the unit in enabling them to feel more comfortable about interacting with seriously ill patients, and the performance scores were significantly improved after the unit. Overall reception of the unit by faculty and students was very positive indicating a desire on the part of students to understand how to work with seriously/terminally ill patients and an appreciation on the part of faculty for a prepared curriculum unit for dietetic students.
On the basis of the results of this study and the responses from both faculty and students, it is urged that dietetic educators consider death education as an integral part of the preparation for performance as a clinical dietitian. The curriculum unit, including the film designed for this study, were well-received. It is hoped that this unit will be the start of the development of appropriate materials that address the particular concerns of dietetic educators and practitioners.

Further recommendations are:

1. The achievement test should be broadened to include items related to empathic behavior in the counseling situation. Results from such an achievement test might indicate a relationship between knowledge and behavior in the clinical setting that were not demonstrated in this study when items related to understanding the grief process were used.

2. The results from use of the performance evaluation tool developed for this study were promising. Further study of the instrument as an evaluation tool for developing empathic counseling skills is recommended. In this study, empathy was measured as the personality trait. Adapting or developing an instrument to measure state empathy within interpersonal situations would be valuable. Relationships might then be found between a measure of state empathy and results from the performance evaluation scale.
3. It is recommended that further development work be done on the Dietetic Student Attitude Scale. With further refinement, this instrument might be used as a predictive indicator for identifying students who can relate comfortably to terminally ill clients.

4. Although measuring and evaluating the effect of educational intervention on the affective learning of students remains difficult, the results and responses indicated a need on the part of students for educational preparation before they are assigned dying patients in their clinical courses. It is hoped that further interest in appropriate death education will continue for the sake of the students and the seriously/terminally ill patients.
ACKNOWLEDGEMENTS

For the assistance and support of many persons, I acknowledge my gratitude. I especially wish to express my thanks to:

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• My husband, David, and three sons, Mark, Tom and Jonathan for their support during these years;
• The students and colleagues who participated in the project.

The project was reviewed and certified by the University Human Subjects Review Committee prior to data collection for the study.
LITERATURE CITED


Unit Topic - Counseling Seriously Ill Clients

Goal - To enable students to interact comfortably with seriously ill clients

Major Concept - Developing abilities to work with seriously ill clients

Generalizations - Health professionals need to develop their abilities to work with grieving clients and their significant others. This work requires an understanding of the grieving process and being able to deal with the stress of working with these clients. Students need to consider how health professionals are perceived by the dying and their families.

Objectives -
After the didactic and film presentations the student will

- identify the uses and abuses of Kübler-Ross stage theory in anticipatory grief.
- define the two general types of loss.
- differentiate among the six forms of grief.
- identify at least four physiological manifestations of grief.
- identify at least three ways to help grieving patients and their families.
- identify ways in which stress can be managed by health professionals.
Session One - Grief, The Needs of the Dying and the Needs of the Health Professional

Length of Lesson 40-50 min.

I. Introduction

A. The universality of death
   Everyone dies, but our society is very much a death-denying society.

   Due to scattering of nuclear families, children have very little opportunity to be around aging relatives.

   Many of the dying are isolated in nursing homes and health care institutions.

B. Training of health care professionals is based upon the usual medical model of diagnose, treat, cure. The general assumption of this model is that all illnesses can be identified, treated and cured. This medical model will not fit the dying person. Therefore, we as health professionals need to develop skills for working with dying patients.

II. Understanding Grief

A. Grief can be defined as the emotional reaction to the perception of loss.

   - In general there are two types of losses

      1. Real or Physical
         - Losing a possession
         - Death of a friend
         - Amputation of part of the body

      2. Symbolic or Psychosocial
         - Decreased status due to job demotion.
         - Divorce
         - Loss of social contact (can be seen in patients)

B. Forms of Grief - as outlined by Wayne Oates, University of Louisville

   1. Anticipatory grief - This is the most prominent type of grief
      E. Kübler-Ross - Stage theory fits here

      Stages were proposed as a theory to explain the sequence of emotional response.
The Five Stages are:

I. Denial
II. Anger
III. Bargaining
IV. Depression
V. Acceptance

Caution needs to be made that this is a theory. People do not necessarily evolve through the stages in sequence. Nor should they be used to categorize people too quickly or pressure them to move from one stage to the next.

2. Acute or traumatic grief -

This form of grief has been described most clearly in the landmark work of Erich Lindemann after his work with the survivors of the tragic Cocoanut Grove Fire in 1944.

a. Somatic distress - waves of distress from 20 min. 1 hr.
   Some typical symptoms - feeling of tightness in the throat, shortness of breath, need for sighing, lack of strength.

b. Preoccupation with the image of the deceased. Sometimes these images are very vivid and people are very concerned for their sanity.

c. Guilt - "The bereaved searches the time before the death for evidence of failure to do right by the lost one."

d. Hostile reactions in their relationships to other people.

e. Loss of patterns of conduct - Inability to concentrate, to sit still, to be able to complete a task begun.

3. Chronic or "No-End" Grief

Ex. - Child with severe handicaps but a relatively normal life expectancy.
   - person rendered quadriplegic, hemiplegic or paraplegic
   - massive public embarrassment - loss of job, imprisonment, etc.
4. "Near-miss" grief - Have to re-organize lives now that they find they aren't going to die in the near future.

Ex. - There have been problems of re-adjustment for families with children with leukemia who have been cured by chemotherapy.

5. Pathological grief -

Psychiatric diagnosis is beyond our scope but it usually is manifested by exaggeration of usual response.

a. absence of a grief reaction.
b. prolongation of a normal grief reaction.
c. distortion of the normal grief reaction.

6. Tragic sense of life - perhaps most intensely felt by those in the helping professions"arise from the sense of being human, limited and subject to death ourselves" - Oates, 1982.

C. Grief Work - Also based on Lindemann's work with survivors of the Cocoanut Grove Fire

Three tasks have been identified

1. Emancipation from the bondage of the deceased "untwisting the tie that binds".

   This does not mean that the deceased is forgotten or not loved.

2. Readjustment to the environment in which the deceased is missing.

3. Formation of new relationships.

D. Physiological Manifestations of Grief -

A mourner may have one or more of the following symptoms

- anorexia
- GI distress
- insomnia
- crying
- physical exhaustion
- lack of sexual desire
- shortness of breath

- Statistically the bereaved are at high risk of becoming ill or dying themselves in the first six months to a year after a loss.
- Nutritional status—does need to be monitored—need strength to effectively cope with loss.
- Inadequate intake will further compromise the physical state of the bereaved.
III. Help for the Griever -
- Grievers need acceptance, non-judgmental listening
- Needs to feel that we are there with and for them.
- The griever is the seriously ill patient as well as the family.

Here are some things not to do
- Do not feel that you need to be a psychologist, pastor or psychiatrist for the person.
- Do not encourage responses in the person that are the opposite of appropriate grief.
  Ex. Saying "Don't cry"., "Don't be angry", "There are people who have things worse than you do", "Look on the bright side"
- Do not let your feelings of helplessness keep you from reaching out to the grievers. For the grievers, learning to deal with separation is more likely to occur if he/she is not actually deprived of human contact.
- For the seriously ill there are two tasks
  1. The process of anticipatory grief
  2. Enjoyment of remaining satisfactions and accomplishments

IV. Handling stress - Help for the Professional

A. Coping Sequence for health professionals
Model developed by Bernice Harper to describe the developmental and coping stages that occur in persons working with dying patients.

1. Intellectualization. The professional concentrates on the disease processes rather than on death.
2. Emotional survival. A stressful, emotional period in which the trauma of death is experienced. This rush of a gamut of feelings - guilt for being healthy, fear of contracting diseases of patients, disturbing dreams - may be followed by the next stage, depression.
3. Depression -

The health professional may feel depressed and exhausted. The reality of the dying process is accepted. If death is not accepted, the person may leave the field of working with the dying or build personality defenses to not interact with the dying in a manner that would make them vulnerable.

4. Emotional arrival. The health professional emerges from the depression and becomes free from over-identification and over-involvement with patients. Even here there is emotional pain, but without its debilitating effects.

5. Deep compassion - Health professional can respond compassionately to patients with the full acceptance of their impending death.

Remember this is a proposed model that may be helpful to you in attending to your own feelings but do not let these categories be repressive for you. Clinical experience exposes us repeatedly to loss. Part of being a compassionate health professional is becoming a professional survivor.

B. How to get support while you're giving it. As humans we have to receive in order to be able to give.

1. Replenish yourself - physically, socially, emotionally, intellectually and spiritually.

Give students time to list ways in which they could replenish themselves.

2. Develop boundaries between your personal and professional lives.

   a. Adopt a "decompression routine" for the rite of passage from your work life to your personal life i.e., going for a run, taking a hot bath, reading the newspaper.
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<th>Lesson Outline</th>
<th>Teaching Strategy</th>
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<td>b. Do not let your personal life be consumed by your work.</td>
<td>Give students time to jot down in their notebooks an outline of their support network.</td>
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<td>c. Participate in a professional support group - This is important so spouses, children, and friends are not continually confronted with your problems from the clinical area.</td>
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<td>d. Avoid developing a work-oriented social network. Need a balance and diversity in your professional relationships and social relationships.</td>
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**Closure**

5 minutes

Briefly summarize the lesson
- understand the process of grief
- learning to help the seriously ill/dying person and his/her family
- identifying the sources support the health professionals.

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Iowa State University
Home Economics Education
M.J. Oakland
3/83
<table>
<thead>
<tr>
<th>Resources</th>
<th>Lesson Outline</th>
<th>Teaching Strategy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tape recorder</td>
<td>Session Two - Exploring feelings about death</td>
<td>Use the provided tape or recount several of your own experiences.</td>
</tr>
<tr>
<td>15 minutes</td>
<td>Sharing experiences of working with the dying patients.</td>
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<td></td>
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<tr>
<td>Body of Lesson</td>
<td>Question to begin discussion - What was the first experience you had with death?</td>
<td>Divide group into small groups of 5-3 students.</td>
</tr>
<tr>
<td>20 minutes</td>
<td>Who died? Can you describe your feelings? Have you had further experiences? Were your feelings different? Students may (will) differ greatly in their experiences. Some will be describing the death of a pet and others the death of a parent or sibling. Do not force students to share.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Summarize the tone of the discussion. Although it may be painful, we need to get in touch with our own feelings about death and the dying process to be an effective worker with the seriously and terminally ill.</td>
<td>Summary of discussion to entire group.</td>
</tr>
<tr>
<td>Closure</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5 minutes</td>
<td></td>
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</tr>
</tbody>
</table>
### Session Three - How are health professionals viewed by dying patients and their families.

**Introduction**

A small introduction to the film maybe desirable. Pass out Kleenex and assure students that crying is acceptable. Pass out post-test and attitude survey forms to be filled out after the film. The film tells the story of Peggy Neppel Darrah's battle with cancer. Her experience is relayed to us by her husband, Mark Darrah. At the time Peggy became ill she was a Ph.D. candidate in animal nutrition researching the role of neural hormones in porcine stress syndrome. As an undergraduate, Peggy Neppel was a pioneer in women's distance running. She set numerous university and national records. She won the first national cross-country competition held for women. Before she quit running competitively she held three world's records in 1500, 3,000 and 10,000 meters. After establishing these records, Peggy decided she had reached her running goals and stopped running competitively to concentrate more fully on her graduate work. At approximately that time she married Mark Darrah, a Ph.D. student in Bio-medical Engineering.

**Show film**

Let students fill out questionnaires. As these are being collected, open discussion to bring this session to a close. Remain sensitive because many students may not be able to talk. Students seem to be able to identify with the medical professionals in the film so that is a possibility for starting the discussion. Another approach might be, "Get in touch with your own feelings. Can you share some of what you are feeling."

---

**Resources**

- Video-tape player and monitor
- Kleenex

**Teaching Strategy**

Viewing film, "Peggy's Final Victory".

**Lesson Outline**

- Post-test
- Death Attitude Survey and Multiple Choice Questions
UNDERSTANDING GRIEF

GRIEF IS THE EMOTIONAL REACTION TO THE PERCEPTION OF LOSS.

GENERAL TYPES OF LOSSES

1. REAL OR PHYSICAL

2. SYMBOLIC OR SOCIAL
FORMS OF GRIEF

1. ANTICIPATORY

2. ACUTE OR TRAUMATIC

3. CHRONIC SORROW

4. "NEAR-MISS"

5. PATHOLOGICAL

6. TRAGIC SENSE OF LIFE ITSELF

WAYNE OATES

IN

MEANING OF HUMAN SUFFERING

F. Dougherty, ed.

Human Sciences Press, 1982
I. DENIAL

II. ANGER

III. BARGAINING

IV. PREPARATORY DEPRESSION

V. ACCEPTANCE

TERMINAL DIAGNOSIS

DEATH: THE FINAL STAGE OF GROWTH.

E. KÜBLER-ROSS

PRENTICE-HALL. 1975
ACUTE OR TRAUMATIC GRIEF

SYMPTOMS OF NORMAL GRIEF

1. SOMATIC DISTRESS
2. PREOCCUPATION WITH IMAGE OF THE DECEASED
3. GUILT
4. HOSTILE REACTIONS TO OTHERS
5. LOSS OF PATTERNS OF USUAL CONDUCT

ERICH LINDEMANN
AM. J. OF PSYCHIATRY 101(2):141-149, 1944.
GRIEF WORK - TASKS TO BE ACCOMPLISHED

1. "UNTYING THE TIE THAT BINDS"

2. READJUSTMENT TO THE ENVIRONMENT IN WHICH THE DECEASED IS MISSING

3. FORMATION OF NEW RELATIONSHIPS
HANDLING THE STRESS OF WORKING WITH THE DYING

PROPOSED MODEL-COPING SEQUENCE

1. INTELLECTUALIZATION
2. EMOTIONAL SURVIVAL
3. DEPRESSION
4. EMOTIONAL ARRIVAL
5. DEEP COMPASSION

BERNICE HARPER
HOSPICE EDUCATION PROGRAM
FOR NURSES.
U.S. GOVERNMENT DOCUMENTS.
1981.
References


Please circle your answer to each of the following questions.

1. The stages of dying theorized by Elizabeth Kubler-Ross are
   a. bargaining, denial, depression, anger, and acceptance.
   b. bargaining, resignation, anger, and acceptance.
   c. bargaining, disbelief, depression, and anger.
   d. bargaining, denial, helplessness, anger, and acceptance.

2. A patient on your floor refused to believe that the physician had diagnosed his illness correctly. He had been told that he had a tumor that had metastasized throughout his lymph system. This couldn't be happening to him - he was only 25 years old. They must be wrong; he would seek another opinion. This is an example of the stage of dying known as
   a. anger.
   b. denial.
   c. bargaining.
   d. depression.

3. When a person has a terminal illness
   a. friends tend to gather to spend time with the person.
   b. friends tend to drift away.
   c. friends feel uncomfortable but know they must come and be with the person.
   d. friends are anxious to talk to the person so he/she can have the opportunity to express personal feelings about dying.

4. The theory of the five stages of dying of E. Kubler-Ross have been validated by research findings.
   a. True  b. False

5. For a mourning individual to yearn and seek for the significant other who has died is normal.
   a. True  b. False

6. To be helpful to a person who has suffered the loss of a significant other, you should
   a. tell him/her to look on the brighter side of life.
   b. tell the individual that he/she will feel better after the funeral.
   c. say, "Don't cry. Be brave. Don't take it so hard."
   d. encourage the individual to tell you how he/she feels.

7. Most deaths in this country occur in hospitals.
   a. True  b. False

8. Studies have indicated that for at least six months after bereavement, the rate of illness and death for widows and widowers
   a. decrease.
   b. increase.
   c. remain the same.
Attitude Questionnaire - Please circle your answer to each question using the following 5-point scale

1  2  3  4  5
Strongly disagree Disagree Undecided Agree Strongly agree

1. I would hate to visit a dying friend.
2. It would be difficult for me to spend much time with people who are dying.
3. If I knew an acquaintance of mine were dying, I would probably feel uncomfortable around that person.
4. I would willingly talk to a dying person about his/her coming death if he/she wished to discuss it.
5. If a friend of mine were dying, I would rather not know about it.
6. I would rather not know if a member of my family had a fatal condition.
7. I would want to be told if I had a fatal condition.
8. I am afraid of death.
9. I would feel uncomfortable interviewing a patient who was dying.
10. I feel a dietitian has a role in working with dying patients.
11. I would feel sad if a patient with whom I had worked died.
12. I gain a greater appreciation of life by working with dying patients.
13. I feel so sorry for dying patients and/or their significant others that I don't know what to say to them.
14. I feel that I am emotionally prepared for working with dying patients.
The following questions deal with the film you have been shown. Please respond using the same five point rating scale as above.

15. I feel anxious about my ability to communicate with seriously ill patients.  
   1  2  3  4  5

16. I feel it is unprofessional to cry with a patient or significant others.  
   1  2  3  4  5

17. I believe in life after death.  
   1  2  3  4  5

18. I feel that as a health professional I can now relate more openly to my patients.  
   1  2  3  4  5

19. Did you feel that watching the film had a positive impact on you? Yes No Please describe your feelings.

________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________

20. Do you feel that this unit has made you feel more comfortable about working with the seriously ill? Yes No Describe your feelings about this unit.

________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________

Thank you for your help.
Student Questionnaire

Age _____ Sex M _____ F _____ Number of brothers _____ Number of sisters _____

Your birth order in family _____ (1,2,3,4,5, etc.)

Race: White _____ Black _____ Hispanic _____ Oriental _____ American Indian _____

Size of community in which you were raised. Under 5,000 _____; 5-20,000 _____;
20-100,000 _____; over 100,000 _____.

Circle your religious preference?

a. Jewish d. Other; please specify ______
b. Catholic e. None
c. Protestant

Would you describe yourself as

a. Very religious
b. Somewhat religious
c. Not religious

Who died in your first personal involvement with death?

a. Grandparent or great-grandparents
b. Parent
c. Brother or sister
d. Other family member
e. Friend or acquaintance
f. Stranger
g. Public figure
h. Animal

Has a death(s) occurred in your immediate family (i.e. father, mother, brother,
sister, grandparents) Yes _____ No _____

If yes, please identify the relationship to you _________________

Did the death occur in the past 5 years? Yes _____ No _____

Have you had a close friend die? Yes _____ No _____

In the past five years? Yes _____ No _____

Have you participated in the past in an academic course in death and dying? Yes _____ No _____

A seminar (less than 10 hours)? Yes _____ No _____

What was the main reason you chose the profession of dietetics? (Choose one)

a. Availability of jobs
b. Interest in foods and nutrition
c. Interest in managing a food service system
d. Opportunity to help people
e. Interest in a health care profession
What type of a position would you like to have as a dietitian?

___ a. Administrative dietitian
___ b. Clinical dietitian—medical facility
___ c. Out-patient or private practice
___ d. Research
___ e. Teaching
___ f. Undecided
DIETETIC INTERVIEW OBSERVATION FORM

Student initials ___ Observer initials ___ Date ____________________________

Client # ______ Sex ___ Age ___ Diagnosis and/or presenting symptoms: ____

_________________________________________________________

Diet order ______________________________ Purpose of Interview __________________

Is client being interviewed? Yes ___ No ___ If not, describe relationship to client of
person being interviewed. ____________________________________________

Total length of interview: _______ min. Relationship- _______ min. Problem solving
establishing _______ min. phase _______ min. phase _______ min.

Has dietitian had previous contact with this client? Yes ___ No ___

1. Seating arrangement: Check the seating arrangement observed at 5-10 minutes after
beginning of interview.

   a. ___ Both interviewer and client stand.

   b. ___ Interviewer stands, client sits/bed.

   c. ___ " " , " sits/bed.

   d. ___ " " , " lies/bed.

   e. ___ Interviewer sits/bed, client stands.

   f. ___ " " " , " sits/bed.

   g. ___ " " , " sits/bed.

   h. ___ " " , " lies/bed.

   i. ___ Interviewer sits/bed, client stands.

   j. ___ " " , " sits/bed.

   k. ___ " " , " sits/bed.

   l. ___ " " , " lies/bed.

   m. ___ Other; Please specify _______________________________________

2. Distance between the interviewer and client

   The interviewer and client were positioned:

   a. ___ less than 2 feet apart.

   b. ___ 2 feet apart.

   c. ___ more than 2 feet apart.
3. Body posture - Rate body position of client-patient at 5-10 min. after beginning of interview.

<table>
<thead>
<tr>
<th>a. Client</th>
<th>b. Dietitian</th>
<th>Body Position</th>
</tr>
</thead>
<tbody>
<tr>
<td>1) ______</td>
<td>_____</td>
<td>Lean toward other</td>
</tr>
<tr>
<td>2) ______</td>
<td>_____</td>
<td>Lean away from other</td>
</tr>
<tr>
<td>3) ______</td>
<td>_____</td>
<td>Arms tensed or closed around body</td>
</tr>
<tr>
<td>4) ______</td>
<td>_____</td>
<td>Arms in relaxed, open position</td>
</tr>
<tr>
<td>5) ______</td>
<td>_____</td>
<td>Fingers of hands open</td>
</tr>
<tr>
<td>6) ______</td>
<td>_____</td>
<td>Fingers of hands closed</td>
</tr>
<tr>
<td>7) ______</td>
<td>_____</td>
<td>Frequent eye contact</td>
</tr>
<tr>
<td>8) ______</td>
<td>_____</td>
<td>Avoids eye contact</td>
</tr>
<tr>
<td>9) ______</td>
<td>_____</td>
<td>Other: (Client) - Make specific comments that might affect this for patient (i.e. in pain, traction, etc.)</td>
</tr>
</tbody>
</table>

| 10) ______ | _____        | Other: (Dietitian) - Describes any extenuating circumstances for the dietitian |
Using the following scale, record the appropriate number in the blanks provided.

<table>
<thead>
<tr>
<th>Rating</th>
<th>Not acceptable</th>
<th>Poor</th>
<th>Acceptable</th>
<th>Good</th>
<th>Very Good</th>
</tr>
</thead>
</table>

### RELATIONSHIP-ESTABLISHING PHASE:

A. Does not introduce self.
   - Introduces self
   - Introduces self in a friendly manner.

B. Does not attempt to explain reason for interview.
   - States reason for interview.
   - Explains reason for interview and checks for client understanding.

C. Conversation focuses on student rather than client.
   - Focuses conversation toward client.
   - Pursues conversational topics provided by cues from client.

### PROBLEM-SOLVING PHASE:

D. Uses closed questions to elicit information.
   - Uses closed and open-ended questions to elicit information.
   - Consistently uses open-minded questions to elicit information.

E. Does not ask questions related to client's lifestyle.
   - Deals with information if client volunteers information related to life-style.
   - Asks questions related to client's lifestyle.

F. Elicits inappropriate amounts of information (too much or too little).
   - Tries to elicit more (or less) information, but not always successful.
   - Elicits appropriate amounts of information.

G. Expresses disinterest in client's comments (concerns).
   - Casual or brief response to client's comments (concerns).
   - Expresses understanding (reassurance) of client's comments (concerns).

### CLOSING PHASE:

H. Discourteous in terminating interview or ignores cues that client's condition is such that interview should be discontinued.
   - Terminates interview abruptly.
   - Terminates interview courteously when information is gathered or client's condition indicates that interview should not continue.

I. Client terminates interview abruptly—may verbally indicate dissatisfaction.
   - Client ends interview courteously.
   - Client verbally indicates satisfaction ("looking forward to another "visit", etc.)
APPENDIX F
Dietetics Research Consent Form

Dear Student:

You are invited to participate in a research project that will study dietetic students in selected Coordinated Undergraduate Programs in Dietetics. You will be asked to answer a series of questionnaires, participate in a curriculum unit and then complete more paper and pencil items. The total time involved for completing the questionnaires will be approximately two to two-and-a-half hours. Your grade point average will be needed to correlate with other data that will be collected. The information gathered from you will be coded to insure your anonymity. You are free to withdraw from this study at any time.

Your participation is greatly appreciated as we seek to improve your education as a CUP student.

Sincerely,

Mary Jane Oakland, M.S., R.D.
Assistant Professor
Food and Nutrition Department
Iowa State University

Ruth P. Hughes, Ph.D.
Major Professor
Mary B. Welch Distinguished Professor
in Home Economics
Head, Department of Home Economics Education
Iowa State University

I have read the above agreement and do give my permission for the release of my cumulative grade point average to the above mentioned researchers. I realize my participation in this research project is voluntary and that I may withdraw at any point in the program.

________________________________________
Signature of student

__________________________
Date