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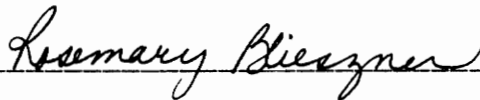
INTEGRITY/DESPAIR, LOCUS OF CONTROL  
AND LIFE SATISFACTION AMONG  
ELDERLY RESIDENTS OF HOMES FOR ADULTS

by

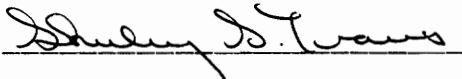
Mary Ellen McDonald

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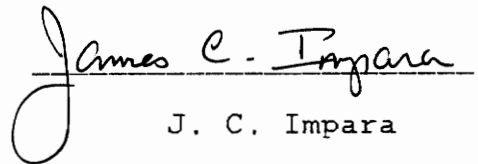
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Mary Ellen McDonald

Committee Chair: R. Blieszner

Family and Child Development

(ABSTRACT)

As the number of elderly individuals in the population continues to increase, the demand for alternatives to group care settings will also increase. Homes for adults represent an example of the diversification of long term care options by providing care to elderly individuals in a setting that is more home-like and less institutionalized than traditional nursing homes. Since previous research is often limited to nursing home residents, the study of home for adult residents offers a fresh approach to sample selection, and provides reassurance that the needs of elderly residents are indeed being met not only in terms of custodial care but also in a therapeutic sense that enhances life satisfaction.

In this study, the relationship of integrity/despair, locus of control, and life satisfaction was examined in a sample of elderly persons who reside in homes for adults.

The participants were 17 males and 83 females, ranging in age from 60 to 95 and reporting fair to good health. It was hypothesized that elderly individuals who felt in control of their lives would also be more satisfied with life. Additionally, it was proposed that elderly individuals who looked back on their lives and were not satisfied would be afraid to die and would feel little or no control over their lives. Death anxiety, as measured by the Death Anxiety Scale (Templer, 1970) was used to define integrity/despair. The indicator of locus of control was the Mastery Scale (Pearlin & Schooler, 1978), and life satisfaction was assessed with the Philadelphia Geriatric Center Morale Scale (Lawton, 1975).

Correlation analysis yielded the following results: (a) the more internal an individual's locus of control score, the lower the death anxiety score, (b) the more internal the locus of control, the higher the life satisfaction score, and (c) the higher the life satisfaction, the lower the death anxiety score. These findings supported the hypotheses and indicate that elderly individuals who feel in control are also satisfied with their lives and are not afraid to die.

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INTEGRITY/DESPAIR, LOCUS OF CONTROL  
AND LIFE SATISFACTION AMONG  
ELDERLY RESIDENTS OF HOMES FOR ADULTS

Chapter I  
Introduction

As people live to advanced age, they may develop physical frailties and disabilities that limit their day-to-day functioning. In the past, many aging persons needing assistance were placed in nursing homes, since these facilities were the prevailing option for their care. More recently, long term care options have become more diversified. For example, with the development of homes for adults, older persons who do not require intensive nursing care can receive the specific supervision needed in a facility that is more home-like and less medically-oriented and institutionalized than a nursing home.

Traditionally, nursing homes have been considered as undesirable places to live that have detrimental effects on life satisfaction. Thus, research efforts have been directed towards improving the quality of nursing home life and dispelling negative perceptions. The focus has been not only on the custodial care but also on the therapeutic care offered in institutions. In contrast, little to no research

exists on the quality of life in homes for adults.

One approach to evaluation of adaptation, functioning, and quality of life in group care settings has been to focus on personality constructs and their relationship to life satisfaction. Such research has been conducted with residents of nursing homes but not homes for adults. Examples of the constructs studied include integrity/despair and locus of control. Some researchers have examined each construct and its effect on life satisfaction separately, but the results have been contradictory. Failing to consider both constructs simultaneously has limited the assessment of related personality domains and their influences on life satisfaction. Another limitation is that individuals residing in nursing homes often vary in functional capacity, yet researchers have not examined the influence of functional status differences on assessment of these personality constructs. Assuming that all residents of nursing homes are similar on functional capacity is not valid, and generalizing across studies of "institutionalized" individuals (without examining functional status differences among sample members) may be unwarranted.

A reasonable approach to address some of these limitations in the literature is to study aged individuals

of similar functional capacity. One way of accomplishing this goal - as well as the goal of extending research on the quality of life in long-term-care (LTC) facilities to an underinvestigated population - is to focus on homes for adults. The admission and retention policies of homes for adults are regulated by state licensing requirements. Thus, residents are likely to have functional status similar to each other and higher than individuals in institutions such as nursing homes. Additionally, examination of personality characteristics and adaptation to group living in home for adult residents can contribute to an enhanced understanding of quality of life in a form of long term care that is likely to be used with increasing frequency as the population ages.

The purpose of this study is to examine integrity/despair, locus of control, and life satisfaction among elderly persons who reside in homes for adults. The central research question is, what is the relationship among life satisfaction, locus of control, and integrity/despair in a sample of home for adult elderly persons? It is expected that data from this study will provide theoretically based suggestions for evaluating quality of life issues in homes for adults.

## Chapter II

### Literature Review

#### Homes for Adults

A home for adults is a licensed LTC facility that provides a variety of services to its residents. Individuals residing in homes for adults have decided for one reason or another to no longer live independently in the community. The majority of residents are elderly and need supervision and assistance with activities of daily living. Services generally include room, meals, laundry, and housekeeping. Staff members maintain contact regularly with the residents and provide personal assistance to individuals in need. Personal care includes help with bathing, dressing, getting in and out of bed, taking medications, and arranging transportation. The Commonwealth of Virginia has licensing procedures specifically for homes for adults, including requirements for buildings and personnel, admission and discharge of residents, rights and responsibilities of residents, and so forth (Code of Virginia, 1990). Homes for adults are also called board and care homes, domiciliary facilities, sheltered housing, residential care facilities, and homes for the aged (Skolnick, 1985).

Although many elderly individuals are residents of homes for adults, the population has not been studied. Instead, research has been limited to nursing home residents. As mentioned previously, it is important to study the home for adults population because of the trend toward more alternative housing arrangements for elderly individuals who need supervision but are not seriously impaired, and because these individuals may be future residents of nursing homes. Thus, because of limited research, a literature review of integrity/despair, locus of control, and life satisfaction among residents of LTC facilities can only address these constructs from a nursing home perspective and not a home for adults viewpoint. Nevertheless, the literature review provides a basis for generating hypotheses concerning home for adult residents.

#### Integrity and Despair

One of the few theories that addresses personality development and change occurring throughout the entire life-span is Erik Erikson's epigenetic theory of psychosocial development. This theory encompasses eight stages of ego development which provide a framework for looking at challenges people experience as they move through the life course. Erikson (1950) postulated that personality development is determined by the direction (positive or

negative) in which the outcome of each stage or crisis is resolved. "Resolution of each crisis is expressed as a point on a continuum rather than an absolute and is considered to influence the resolution of all subsequent crises" (Woods & Witte, 1981, p. 165). The eighth stage outlined by Erikson occurs in old age and is signified by a crisis between ego integrity and despair. According to his theory, the development of ego integrity involves a positive life review process that results in an acceptance of one's life and oneself. In contrast, when an individual does not accept his/her life, and the life review process is negative, then the outcome the individual experiences is despair. Despair is signified by a fear of death and the feeling that time is too short to achieve personal goals. Thus, according to Erikson's theory, individuals who (after making retrospective glances) are satisfied with their lives, also have a high degree of ego integrity and do not view death as something which elicits anxiety or arouses fear (Given & Range, 1990).

#### Integrity/Despair and Life Satisfaction

For many elderly individuals, this last stage or crisis of life must be resolved in an institutional setting such as a nursing home or home for adults rather than their own home. An elderly individual's achievement of life

satisfaction in such a LTC facility can be a very difficult task. In addition to the many developmental and situational changes experienced by older adults in general, problems associated with the environment of a LTC facility (i.e., routine, restrictive schedules which lack stimulation) require much adaptation (Hyer & Blazer, 1982). Thus, any psychological construct that can be used to assess the life satisfaction of individuals in these types of environments is one worthy of further study (Moos, 1974).

Integrity and despair are constructs of high interest in the assessment and study of the elderly in LTC settings. For example, Taft and Nehrke (1990) discovered that engaging in reminiscence (i.e., life review by talking about the past) was positively correlated with high ego integrity scores and life satisfaction among their institutionalized sample members. On the other hand, there was no significant relationship between the actual frequency of reminiscence (i.e., how often reminiscence was used) and ego integrity. The authors concluded that residents who engage in any amount of reminiscence are more likely than those who do not reminisce at all to achieve ego integrity.

Nehrke, Hulicka and Morganti (1980) reported that their institutionalized sample also resolved Erikson's last stage. Their sample members resolved the ego

integrity/despair crisis through the aid of their environment, which allowed residents to maintain independence. The residents in this particular setting viewed the environment as encouraging and supportive because staff allowed individuals to make decisions and choices concerning, for example, their personal care and daily activities. The results suggest the importance of examining environmental effects as contributors to life satisfaction and the resolution of Erikson's eighth stage of personality development.

#### Locus of Control

Locus of Control (LoC) is another important variable that can be used to study the relationship between personality and life satisfaction. LoC refers to the degree to which an individual believes that events in life are controlled by oneself (internal) versus an individual's belief that events are caused by fate, chance, or powerful others (external) (Rotter, 1966). According to the most recent review of the literature available on LoC and the aged (Strickland, 1977), researchers believe that, as individuals get older, their LoC orientation tends to change. The direction of this change (internal or external) is still under debate (e.g., Cicirelli, 1987; Fawcett, Stonner, & Zepelin, 1980; Lumpkin, 1986). Therefore, it

seems appropriate to continue to study how LoC functions among elderly individuals. Unfortunately, children and young adults have been the focus of many studies, and only limited research interest and effort have centered on older age groups, especially the institutionalized elderly (Brown & Granick, 1983).

### Locus of Control and Life Satisfaction

Research efforts using LoC measurements among the elderly have yielded mixed results. Some researchers report that elderly individuals with high life satisfaction scores are more likely to have an internal LoC orientation, while other researchers report that older individuals with high life satisfaction scores are more likely to be external. These opposing conclusions are based on two different streams of research.

The first body of research on LoC and life satisfaction focused on the tendency toward internality among the elderly. Hyer, Matteson, and Siegler (1982) pointed out several investigators who discovered that elderly individuals with an internal LoC are more satisfied with life (Palmore & Luikart, 1972); more adjusted to aging (Wolk & Kurtz, 1975); and more able to cope in life (Kuypers, 1971) than elderly individuals with external LoC. Several studies also report that elderly individuals with an

external LoC are more likely to have low well-being scores (Fawcett, Stonner & Zepelin, 1980; Reid, Haas & Hawkings, 1977; Wolk, 1976; Wolk & Telleen, 1976; Wolk & Kurtz, 1975). Finally, it was demonstrated that when an institutionalized person was allowed control over selected events, the result was enhanced well-being and life satisfaction (Langer & Rodin, 1976; Schultz, 1976).

In a comparative assessment, Queen and Freitag (1978) found that nursing home respondents, when compared to community-based individuals, had lower scores on life satisfaction indicators and higher scores on external control indicators. These researchers suggested that an inability to control aspects of one's life perceived as meaningful may result in depression and feelings of helplessness. However, extending this line of reasoning, other individuals who perceive that they do have control over their environment (internality) may be more likely to have higher life satisfaction. In keeping with Rotter's (1966) conceptualization, it seems that when an individual with internal beliefs is placed in a situation perceived as imperfect (i.e., an institution), then the internality should aid the institutionalized person to make the best of a situation. Thus, an internal LoC, rather than an external LoC, may be associated with life satisfaction (Fawcett,

Stonner & Zepelin, 1980).

The second set of research on LoC and life satisfaction has emphasized the tendency toward externality in old age. Lumpkin (1986) suggested that, as years go by, the elderly population on the average becomes more externally-oriented than when they were younger. This conclusion was not based on longitudinal data but rather on extrapolation from cross-sectional results. He speculated that because of continuing declines in health, activity, and social interaction, elderly individuals may develop more external beliefs and helpless, immature actions. Lumpkin (1986) realized the limitation of his study in his statement, "large scale longitudinal research projects seem necessary to more firmly establish the relationship between locus of control and age" (p. 251). Other researchers (Cicirelli, 1987; Felton & Kahana, 1974) reported that LoC in institutionalized aged persons is highly correlated with several life satisfaction indicators including staff reports, self-rated life-satisfaction, and self-rated morale. The relationship reported was such that externals were more satisfied, while internals were less satisfied with life. Cicirelli (1987) stated that, "the constraints of the institution were better accepted by individuals with external LoC because the constraints fitted in with their general belief about being

controlled by the environment" (p. 138). Thus, Cicirelli (1987) and Felton and Kahana (1974) suggested that in order to cope with institutionalized environments that are rigid, externally controlled elders may use their external belief as an adaptive mechanism.

### Disparity in the Literature

Rotter's (1975) critique of the use of broad-gauged instruments to measure LoC provides some insight into the disparity in the literature. For some time, many personality researchers have been criticized for their assumptions that: (a) an individual's behavior will remain constant when the person is placed in many different situations, and (b) general measures of personality characteristics can be used as accurate predictors of behavior (Mischel, 1968). The use of broad-gauged instruments among institutionalized elderly individuals is especially a problem. Institutionalized elderly people reside in a setting different from elderly individuals living in the community. Some broad-gauged instruments may not accurately measure factors directly related to this unique setting. Although Rotter's scale is the most widely used measure of LoC, many of its items do not directly relate to elderly individuals residing in homes for adults. Rotter (1975) stated that when studying LoC, one must be

careful not to ignore the value an individual places upon the reinforcement that is likely to be received or expected. Often, LoC measures used with older adults include questions about situations that are not of value to elderly people, and from which they are unlikely to receive reinforcement of their control beliefs. Rotter's scale possesses this shortcoming with respect to elderly people in LTC facilities. Thus, measures with items having reasonable psychometric properties as well as face validity to institutional settings would be more appropriate than measures including questions about situations that are not relevant to older people. The scales should be as close a measure to Rotter's original conception of LoC (providing a means for assessing construct validity), while posing questions of relevance to elderly individuals in institutions or homes for adults.

Researchers have attempted to achieve this goal in several ways but fall short of perfection. For example, Reid, Haas, and Hawkings (1977) used a situationally specific Desired LoC measure designed for the institutionalized elderly. Although the authors asserted that this scale takes into consideration the environmental circumstances inherent in the institutional setting, the items in this instrument do not appear to be a measure of

Rotter's original conception of LoC and may not be highly correlated with Rotter's instrument. Reid et al. (1977) found, however, that internality as measured by their scale correlated with well-being (i.e., nurses' ratings of resident's happiness and respondents' self-ratings of contentment and happiness).

Other researchers (Cicirelli, 1987; Felton & Kahana, 1974) using LoC measures designed for institutions, found LoC correlated with measures of well-being, but many criticisms have been levied upon such results. For example, in Cicirelli's (1987) finding that individuals with external LoC beliefs had higher life satisfaction in institutions, the measure of LoC also was not based on Rotter's original scale, but was rather a measure of "health" LoC, and the participants were patients of an acute-care hospital rather than a nursing home. In light of the measurement tool used and the setting, it seems unwarranted to generalize about the relationship between LoC in this setting and in a LTC environment. It is difficult to determine if findings were specific to the variables used or to a more general phenomenon.

In addition, Felton and Kahana's (1974) finding of LoC as predictive of life satisfaction (described earlier), and their suggestion that an internal LoC may be maladaptive for

the institutionalized elderly, was premature for several reasons. Besides the finding contradicting previous research on LoC and life satisfaction, as Felton and Kahana pointed out themselves, their finding may be a direct result of the LoC measure they devised and not the respondent's actual beliefs. The instrument consisted of nine hypothetical situations (believed by the authors to be characteristic of institutional settings), and the respondents were asked to solve the problem presented in each situation. If the participant used the "self" to solve the hypothetical problem, the response was scored as internal. If, on the other hand, the respondent relied on "others" as the source of solution, the responses were scored as external (Fawcett, Stonner, & Zepelin, 1980). The problem with this scoring method is that it is difficult to determine if the responses are reflections of actual internal or external beliefs or just responses to hypothetical situations that do not accurately measure problems that need solving in institutions. To endorse seeking help from another individual does not mean that a person is external in LoC. Thus, Felton and Kahana's assumption that an external individual gets help from others does not accurately measure Rotter's original conception of LoC because individuals can seek help from others and still

maintain control.

In addition, this finding has problematic implications for the management of institutions. The care offered in institutions is often custodial, not therapeutic and, despite good intentions, a conclusion that externality is adaptive could discourage therapeutic, rehabilitative approaches within institutions (Fawcett, Stonner, & Zepelin, 1980). Thus, the suggestion that life satisfaction in institutions is based on external LoC in the individual must be approached with great caution if not rejected altogether. For example, Vallerand, O'Connor, and Blais (1989) found that elderly people living in high self-determination nursing homes (i.e., residents were allowed control over every-day activities such as mealtime, caring for a fish, or how their room furniture was arranged) reported more life satisfaction than elderly persons living in low self-determination nursing homes. Also, the results of the study revealed that there was no difference in life satisfaction among elderly individuals living in high self-determination nursing homes, low-cost housing, or regular community housing. The authors concluded, therefore, that, "those elderly persons who live in nursing homes that provide opportunities for self-determination in every-day activities report as much life satisfaction as elderly people living

independently in the community" (p. 282).

The disparity in the literature may also be attributed to a generalization across different samples. Although the individuals may all be nursing home residents, this does not ensure homogeneity of groups. The residents may, in fact, be very diverse in terms of functional capacity. Also, individuals who reside in nursing homes tend to have many functional limitations. Thus, functional capacity could influence a measure of LoC.

#### Relationships Among Integrity/Despair, LoC, and Life Satisfaction

By taking LoC a step further in the comparison to ego integrity and despair, Baum and Boxley (1984) discovered that among a sample of community, institutionalized, and affiliated (community residents who were actively involved in a group membership club) elderly, those with internal LoC had lower levels of death anxiety (suggesting integrity in Erikson's framework), whereas those with external LoC displayed higher levels of death anxiety (suggesting Erikson's theoretical state of despair). In relation to this, Nehrke, Hulicka, and Morganti (1980), using only an institutionalized sample, also suggested that despair is associated with external LoC and integrity with internal LoC. They drew this conclusion based on the finding that

the study participants who were more advanced in the resolution of the ego integrity versus despair crisis were also more satisfied with their lives, had a more positive self-concept, and had an internal LoC as compared to those who were less advanced in the resolution of the ego integrity versus despair crisis.

The literature relating LoC, Erikson's theory of ego integrity versus despair, and the life satisfaction of institutionalized elderly individuals contains several inconsistencies. Some investigators suggest that an external LoC enhances life satisfaction and integrity, while others support an internal LoC for life satisfaction and integrity. Based on the age of the studies and the nature of the problems described above (e.g., generalization across heterogeneous samples and differences in functional limitations), it is not possible to draw firm conclusions about the association among LoC, integrity, and life satisfaction. Further investigation of this problem is, therefore, necessary. It is the intent of this author to clarify the relationship among these variables using an appropriate measure of LoC while offering a fresh approach to sample selection.

### Hypotheses

The purpose of this study was to examine the relationship of integrity/despair, locus of control, and life satisfaction among elderly individuals residing in homes for adults. The population represents residents of a form of LTC facility that has not been examined previously. Death anxiety, as measured by the Death Anxiety Scale (Templer, 1970), was used to define integrity/despair (i.e., high death anxiety scores indicate despair and low scores indicate integrity). An internal locus of control was defined as high scores on the Mastery Scale (Pearlin & Schooler, 1978), while low scores on the scale represented an external locus of control. Life satisfaction was defined as high scores on the Philadelphia Geriatric Center Morale Scale (Lawton, 1975).

Because despair is characterized by a fear of death, the first hypothesis was that a negative relationship will exist between life satisfaction and death anxiety. In addition, in keeping with Rotter's conceptualization that internality should help an institutionalized person to make the best of an imperfect situation, and that an internal rather than an external LoC may be related to life satisfaction, the second hypothesis was that a positive correlation exists between locus of control and life

satisfaction. The third hypothesis, concerning the association between LoC and integrity, was that a negative correlation exists between locus of control and death anxiety scores. In summary, if elderly people are adequately adjusted through a realization of internal LoC, their retrospective glances of life will yield a positive outcome of integrity, rather than a negative outcome of despair, and an overall satisfaction with life.

## Chapter III

### Methodology

#### Participants

The participants were 100 elderly individuals (17 males and 83 females) with a mean age of 83 years (SD = 7.99, range = 60 to 95). All individuals resided in a home for adults with the average length in the home being 33 months (SD = 37.60, range = 1 to 175). The participants were selected from four homes for adults on the basis of functional status (see below). All but one of the residents were white; one participant was Black. When asked to give a subjective rating of their health, 16 individuals said they had poor health, 45 said their health was fair, 34 rated their health as good, and 5 residents rated their health as excellent.

#### Procedure

A staff member (i.e., director of nursing and/or the administrator) of each facility identified those residents eligible for participation on the basis of their capability and likely willingness to participate. The staff member then evaluated each participant's functional capacity using the Barthel Index (Mahoney & Barthel, 1965).

The individuals were interviewed in their own rooms. The interview progressed as follows:

"Hi (name of person selected). I am (name of interviewer). I am a (graduate) student at Virginia Tech. I am writing a paper on people living in homes like this, and I need your help. I would like to ask you some questions on your feelings about life satisfaction, death, and certain situations. This will only take about 20 to 30 minutes of your time, and if you get tired we can take a break. All of your responses will be kept confidential, and there are no right or wrong answers. Would you like to help me?"

If the person provided verbal consent, he/she signed the verbal consent form (see Appendix A). In the event that the respondent was unable to sign his/her name, an X was used instead, and the interviewer served as witness to this mark. Six other students assisted with the interviews. The helpers were trained on proper interviewing techniques among elderly respondents, and administered the questions in the prescribed order.

Gender, ethnicity, date of birth, and length of residence in the home for adults were provided by the staff. Health status was obtained from the respondents and from the staff as described above. The Mental Status Questionnaire

was then used to assess whether the individuals had sufficient cognitive functioning to complete the interview. This was followed by the Mastery Scale, the Death Anxiety Scale, and the Philadelphia Geriatric Center Morale Scale, respectively. Because the LoC scale has four response alternatives, a response card displaying the choices was made for the participants to look at while answering.

### Measures

The following sections provide descriptions of each scale used in the study. Appendix B includes the scale items and Appendix C contains comparative data from other studies on these scales.

Functional capacity. The Barthel Index (Mahoney & Barthel, 1965) is an instrument used to measure functional status or the ability to perform activities without a personal care attendant. A score is based on a person's ability to perform alone 10 tasks such as feeding, grooming, toileting, and walking. The total score is derived from weighted score values of 15, 10, 5, or 0 on each item. For example, 5 points are given for independent bathing and 0 points if help is required. The possible range is from 0, signifying complete dependence, to 100, signifying complete independence on all 10 functions. Activities are rated by an examiner such as the director of nursing. Test-retest

reliabilities have not been reported, but the Barthel Index correlates with clinical judgement (Wylie, 1967, cited in Kane & Kane, 1981), ability to be discharged to a less restrictive setting (Granger & Greer, 1976, cited in Kane & Kane, 1981), and a prediction of mortality (Wylie, 1967, cited in Kane & Kane, 1981). Kane and Kane (1981) recommend the Barthel Index as a useful instrument when a sensitive tool is needed. For participation in this study, an individual had to have a total score of 55 or higher on the Barthel Index. This inclusion score allowed individuals to receive assistance with the more basic activities of daily living (i.e., bathing), while assuring that the participants were able to perform more crucial daily activities (i.e., continence).

Competence. The Mental Status Questionnaire (MSQ) contains 10 questions developed by Kahn, Goldfarb, Pollack, and Peck (1960) and has been widely used in research with elderly individuals to determine mental functioning. An example of the questions used in this scale is, "What is this place?" Up to two errors is rated as no or minimal impairment, three to eight errors is rated as moderate impairment, and nine to ten errors is rated as severe mental impairment (Kane & Kane, 1981). Kahn reported the test-retest reliability as .80 or better. For the present study,

those individuals who answered 60% of the questions correctly were viewed as having acceptable mental status for participation in the interviews.

Locus of control. Rotter's (1975) critique of the status of LoC research was, "offered in the hope that new studies involving the construct internal versus external control of reinforcement will be carried out, taking into account the underlying theory and recognizing the limitation of this construct and its measurement so that the data obtained can be integrated into a meaningful body of knowledge" (p. 66). As indicated in the literature review section above and this quotation, Rotter's and other LoC scales have a number of limitations, particularly when used in the context of research in LTC settings. Desired characteristics of an appropriate scale are that it is based on Rotter's theory, has face validity for elders in LTC settings, and has reasonable psychometric properties.

Pearlin and Schooler's (1978) Mastery Scale has been used with older adults and appears to have face validity among this population. The measure asks questions regarding control issues based on Rotter's original theory and measures the extent to which an individual regards life events as being under his/her control versus being under the control of fate, chance, or powerful others. For example,

sample items include, "I have little control over the things that happen to me" and "There is little I can do to change many of the important things in my life". The scale consists of 7 items and four response options ranging from 1 (Agree) to 4 (Disagree). Pearlin and Schooler reported a principal components analysis and loadings on one factor ranging from  $-.47$  for the two reverse coded items to  $.76$  for the five other items on this index.

Despair. The Death Anxiety Scale (DAS) used in this study to measure despair was developed by Templer (1970) as an assessment of fear of death. This scale consists of 15 statements, and respondents are asked whether they agree (true) or disagree (false) with each. Templer reported a product-moment correlation coefficient of  $.83$  for test-retest reliability, and a KR-20 coefficient of  $.76$  for internal consistency. He also reported that correlations between the DAS and measures of agreement response set and social desirability response bias were not significant. Finally, based on several studies using different methods (self-report scales, projective techniques) and samples (psychiatric inpatients, college students), Templer provided evidence of construct validity for the DAS.

Life satisfaction. The life satisfaction scale used in this study is the revised version of the Philadelphia

Geriatric Center Morale Scale (PGC) (Lawton, 1975).

According to Lawton, life satisfaction is a multidimensional construct that reflects inner well-being. Based on his research with 1,172 elderly persons and studies by Morris and Sherwood (1975) involving 675 older adults, the revised scale includes 17 items which load on 3 factors: agitation, attitude toward own aging, and lonely dissatisfaction.

Using Cronbach's alpha, Lawton (1975) reported a high degree of internal consistency for these three factors (.85, .81, and .85, respectively). The 17 items are administered either as an interview or a self-completed questionnaire. Yes or no are the answer choices for most items. Test-retest reliabilities are reported between .75 and .80 (Kane & Kane, 1981).

## Chapter IV

### Results and Discussion

#### Results

Descriptive statistics revealed that the participants were highly functioning in both mental and physical status (mean score for the mental status questionnaire was 9 out of 10 maximum points, SD = 1.17, range = 6 to 10, and the mean score on the Barthel Index of physical functioning was 97 out of 100 maximum points, SD = 3.58, range = 75 to 100). These results seem appropriate given the home for adult setting. As stated earlier, the residents of homes for adults do not require the intensive nursing care provided in nursing homes, but rather need specific supervision and assistance with activities of daily living such as bathing, dressing, doing laundry, preparing meals, taking medications, getting in and out of bed, and/or arranging transportation. Thus, many elderly individuals needing some physical assistance but not around-the-clock supervision are attracted to homes for adults because they may currently need or anticipate needing help and desire a setting that is more home-like and less institutionalized than a nursing home.

Frequency distributions for the scales were computed using cross tabulations. The results of this analysis are the numbers displayed in parentheses beside each scale's response options in Appendix B. For example, 41 participants agreed with question number one, 16 tended to agree, 13 chose the response option tend to disagree, and 30 disagreed with question one of the Mastery scale. Descriptive statistics for the Mastery Scale, the Death Anxiety Scale, and the Philadelphia Geriatric Center Morale Scale are shown in Table 1. Cronbach's alpha revealed acceptable reliabilities for the three scales when compared to the reliabilities reported in prior research studies (see Appendix C). These results are also displayed in Table 1.

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 Insert Table 1 about here  
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### Locus of Control

The elderly individuals participating in this study reported a lower mean Mastery Scale score than found in previous research. For example, Janas (1988), using this scale in a study of control, introversion, and social support among Alzheimer's caregivers, reported a mean of 22.61. Grossman (1989) in a study of 173 elderly widowed persons, reported a mean of 25.43 on the Mastery Scale (SD =

4.79). One possible explanation for the lower mean reported in this study is that the elderly participants of the Janas and Grossman studies were community residents and did not live in a LTC facility such as a home for adults. Logically, the community elderly may report a more internal LoC orientation because their environment may allow more control and they are able to care for themselves. Given the more restricted environment of homes for adults as compared to independent living, the mean Mastery Scale score obtained in the present study may actually be high or reasonable for home for adult residents. Further analysis of LoC orientations in this setting is needed to establish norms for home for adult residents on the Mastery Scale.

### Despair

The majority of respondents (81%) reported low death anxiety (see Table 1). Additionally, the participants in this study reported a lower mean score for the Death Anxiety Scale than elderly participants of prior research. Woods and Witte (1981) reported their total mean fear of death as 5.00, with a standard deviation of 2.74, in a sample of 100 men and women 61-89 years of age and living in the community. Goebel and Boeck (1987), using a sample of 51 older adults ages 70 to 90, found a mean fear of death score of 4.37. Residents in homes for adults may not fear death

as much as community dwellers because they (residents of homes for adults) may have different orientations toward death anxiety than community residents. Home for adult residents are more frail than elderly individuals able to reside in the community. As the LTC facility residents engage in the life review process, this frailty may cause the home for adult residents to view themselves as closer to death than elderly individuals living independently. This viewpoint may allow residents of homes for adults to come to terms with their approaching death rather than fear death. Again, in order to more fully understand this lower mean death anxiety score, the results would need to be compared to other studies measuring death anxiety among home for adult residents.

### Life Satisfaction

The mean life satisfaction score for this sample was also low when compared to earlier studies. For instance, Nirenberg (1983), in a study of the relocation of institutionalized elderly individuals, reported a mean of 12.5 for low functioning subjects and a mean of 12.7 for high functioning subjects. It should be mentioned, however, that the elderly individuals in Nirenberg's study participated in either a behavioral skills program or a cognitive skills program. The behavioral skills program

proved to lead to favorable relocation changes, while the cognitive skills program did not. In comparison to the present investigation, the training program in Nirenberg's study may account for some of the higher life satisfaction score found in his sample than in the home for adults sample. The success of the behavioral skills program was not only effective in helping relocated individuals adjust to and not withdraw from their new environment, but also may have increased ratings (e.g., life satisfaction) even beyond levels before treatment. This sample may not only have higher life satisfaction than the home for adults sample, but may even score higher than expected for institutionalized elderly individuals who have not participated in any type of training.

### Hypotheses Tests

The hypotheses were analyzed using Pearson's product moment correlations. The results were as predicted, with all correlations significant at alpha = .05 level of probability: (a) a negative correlation between locus of control and death anxiety ( $t = -6.00, p < .0000$ ), (b) a positive correlation between locus of control and life satisfaction ( $t = 7.03, p < .0000$ ), and (c) a negative relationship between life satisfaction and death anxiety, ( $t = -9.23, p < .0000$ ) were all supported by the evidence

collected. For social science research, the correlations obtained are moderately high and show fairly strong relationships among the variables. The results of this analysis are shown in Table 2.

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Insert Table 2 about here  
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### **Discussion**

This study was designed to investigate the relationship between integrity/despair, locus of control, and life satisfaction among elderly individuals residing in homes for adults. The eighth stage of psychosocial development outlined by Erikson (i.e., Integrity versus Despair) is important to study among elderly individuals in homes for adults because this crisis occurs in old age, is oftentimes resolved in a long term care setting rather than an elderly individual's personal residence, and is related to quality of life issues such as life satisfaction. Locus of control is also important in the evaluation of adaptation, functioning, and quality of life among residents of homes for adults in order to ensure that elderly individuals are allowed to maintain aspects of control they desire or are accustomed to and which lead to a satisfying life. Three hypotheses about the relationships among these variables

were supported.

### Hypotheses

First, the hypothesis that the home for adults residents with an internal LoC would also have low death anxiety was supported. It was expected that high death anxiety scores represent a state of despair, and that those elderly individuals who felt little control would be more anxious and more likely to resolve Erikson's last stage negatively. These individuals would feel as though there was little time left to accomplish their goals and fear what they could not control in the future. They may feel as though they are not ready to die and cannot control what is due to fate, chance, or powerful others. In contrast, those individuals who felt control over their lives would have low death anxiety, representing a state of integrity and a positive resolution of Erikson's last stage. These individuals would look back on their lives as having been meaningful and an accomplishment of their goals. They would not feel as though they are not ready to die, but would accept rather than fear their approaching death.

Second, the hypothesis that the elderly participants with an internal LoC would also report greater life satisfaction was supported. This hypothesis was based on Rotter's conceptualization that when an individual is placed

in an imperfect situation (such as a LTC facility), an internal rather than an external LoC orientation should help the individual make the best of the situation and be more satisfied with life. Additionally, as Goebel and Boeck (1987) stated, "In coping with the stress of facing death in a 'no control' situation, high ego integrity old persons, who feel they have been in control of their lives, may be less susceptible to feeling helpless and hopeless" (p.202). The suggestion here, which seems to be supported by the present findings, is that when older adults look back on their lives, those who seem to be satisfied may gain internal resources that allow them to view their lives as having been meaningful (suggesting integrity). Those, on the other hand, whose retrospective glances yield despair do not achieve this support system within and are vulnerable to stresses viewed as external or beyond their control (suggesting despair).

The last hypothesis supported was that elderly individuals with high life satisfaction would also exhibit low death anxiety. In relation to the first hypothesis, despair is characterized by a fear of death. Thus, Erikson's theory states that those in despair fear death and those in integrity are satisfied with life. It was expected that those individuals whose retrospective glances of their

life revealed satisfaction would not be afraid to die or feel that it was too late to fulfill prior dreams or accomplish goals in life. On the other hand, individuals who reported low life satisfaction would experience death anxiety and feel as though there was not enough time left to accomplish goals or fulfill dreams.

### Integration of Hypotheses

These results suggest that the elderly home for adult residents participating in this study possessing an internal LoC were less death anxious and more satisfied with life. According to Erikson's theory, elderly individuals who are satisfied with their lives and are not afraid to die are in a state of integrity. Those in despair, on the other hand, fear death and are not satisfied with their life. This positive association between an internal LoC and life satisfaction among elderly individuals directly supports prior research also suggesting that an internal LoC is more adaptive for older adults (i.e., Palmore & Luikart, 1972; Wolk & Kurtz, 1975; Kuypers, 1971; Langer & Rodin, 1976; Schultz, 1976; Queen & Freitag, 1978). Also, besides replicating the results of preceding research, this study offers a fresh approach by looking at an underinvestigated population, residents of homes for adults.

### Implications for Future Research

Functional status. Despite the fact that participants were obtained from four different homes for adults, the individuals were very homogeneous in functional status. This homogeneity could serve as a guide for future studies involving similar topics. Generalization across studies containing similar participants may reduce some of the disparity in the LoC literature. For example, some of the disparity in the LoC literature may be attributed to generalization across samples which appear to be similar but are really very different. Although the individuals may all be nursing home residents, they may be very diverse in terms of functional capacity. As physical decline continues within these individuals, their LoC orientations may change. Thus, as functional capacity could influence a measure of LoC, functional limitations may also make the samples heterogenous rather than ensuring homogeneity of groups.

Religious beliefs. The direction of the correlations between LoC and death anxiety, LoC and life satisfaction, and life satisfaction and death anxiety, offers support for the belief that an internal LoC orientation will enable an elderly individual to remain satisfied with life and achieve integrity while residing in a home for adult setting. However, several participants stated in the interviews that

"God" was in control of events. The LoC scales used in research do not traditionally assess religious beliefs. Elderly individuals who view God as in control over aspects of their lives may respond to LoC measures as having little or no control over those areas. They may feel that things happening to them are a result of "God's Will", and not a direct result of their own efforts or actions. Thus, religiosity may have differentially affected the responses of participants and may need to be accounted for in future research and analysis procedures.

Length and type of residence. This study supports Erikson's model of psychosocial development, in particular, the eighth stage. The participants in this study reflect the hypothesized associations between LoC, death anxiety, and life satisfaction. Since most of the participants had been in the home for adults setting a short time (41% of the participants had resided in the home for adult setting one year or less, another 15% lived there under two years, and a total of 80% resided in the homes for adults fewer than four years), they may not have had time to become "institutionalized" (i.e., conform to an environment where decisions are oftentimes made for individuals) and may exhibit a more internal LoC and less death anxiety than might be expected for longer residents. When correlation

analysis was computed for participant's length of residence and score on the Mastery Scale, a small but significant positive relationship was found between these two variables ( $r=.2336$ ,  $p < .05$ ). On the surface, this finding suggests that residents with high LoC scores (internal) were also longer residents. This finding should, however, be interpreted with caution because length of residence was so skewed. The majority of participants used in this study may not have been in the home for adult setting long enough to see any effect of length of residence upon LoC orientation. In order to provide a better test of this relationship, a more diverse sample, including individuals who have resided in the home for adult setting for longer periods, would need to be investigated. The test of the association between length of residence in home for adults and death anxiety scores resulted in a nonsignificant correlation ( $r = .0238$ ,  $p = .81$ ).

Further, longer-term residents are likely to have poorer health as deterioration occurs over time. The participants in this study scored high on the Barthel Index of physical functioning. These individuals could perform most activities of daily living independently, but needed some assistance such that they were no longer able to live independently in the community. With time, the participants

may experience further deterioration and eventually move to a nursing home for around the clock supervision. It may be during this time period that LoC orientations are affected by functional status. As functional status declines, an individual with an internal LoC orientation may begin to exhibit more external LoC viewpoints. Again, when correlation analysis was computed for participant's length of residence and score on the Barthel Index of functional status, a small but significant positive correlation was discovered ( $r = .2778$ ,  $p < .05$ ). This finding should also be interpreted with caution since the residents participating in the study were fairly new to the home for adult setting. These individuals were highly functioning physically, and may not have experienced enough physical decline to affect LoC orientations. One way to test this hypothesis would be to conduct a comparative cross-sectional study of residents in homes for adults (better health) and nursing homes (poorer health) using the same LoC scale for both groups. Another test would be provided by a longitudinal study to determine whether LoC orientation changes as health declines.

Longitudinal research. As suggested above, another important approach of future research is to look at LoC orientations, health, and death anxiety in a longitudinal

study. A sample could be measured over time before entrance into a home for adults setting and again after relocation to a nursing home has occurred (those individuals in the sample not entering into a home for adults would also be followed over time). This approach would help determine if LoC orientation or death anxiety changes or remains stable when an individual experiences a greater loss of physical functioning and is placed into a more restricted LTC facility such as a nursing home.

LTC facility design. A final implication for future research would be to examine the design and management of homes for adults with residents such as those in this study who reported higher life satisfaction, lower death anxiety, and an internal LoC versus the design of facilities where residents report lower life satisfaction, higher death anxiety, and an external LoC. Data on the connection between facility and resident characteristics would enable LTC settings to be designed more efficiently while taking into consideration the therapeutic needs of elderly residents.

## Chapter V

### Conclusion

As the 65 and older age group continues to be the fastest growing segment of the population, alternatives to the type of care offered for these individuals will also increase. More elderly individuals than ever before will be residing in LTC facilities such as nursing homes and homes for adults. The type of care offered in these settings should not only match the custodial needs of elderly individuals, but also meet their therapeutic needs as well. One approach to the evaluation of adaptation, functioning, and quality of life in group care settings has been to focus on personality constructs and their relationship to life satisfaction. Thus, the purpose of the present investigation was to examine the relationship of the constructs integrity/despair, locus of control, and life satisfaction among elderly persons who reside in homes for adults.

Erik Erikson's theory of psychosocial development was chosen because it provides a framework for looking at challenges people experience as they move through the life course. The last stage of life - Integrity versus Despair - occurs during old age, a time when many elderly individuals

are living in LTC facilities. As these LTC facilities residents begin the life review process of Erikson's last stage, they may experience the positive outcome of ego integrity or the negative outcome of despair. Integrity results in an acceptance of one's life and oneself, while despair is signified by a fear of death and a feeling that time is too short to achieve personal goals.

Locus of control was chosen as an important construct related to life satisfaction based upon Rotter's (1966) conceptualization that when an individual with internal beliefs is placed in a situation perceived as imperfect (i.e., an institution), then the internality should aid the institutionalized person to make the best of a situation. Thus, an internal LoC, rather than an external LoC, may be associated with life satisfaction (Fawcett, Stonner & Zepelin, 1980). Additionally, the suggestion by researchers (e.g., Cicirelli, 1987; Felton & Kahana, 1974) that in order to cope with institutionalized environments that are rigid, externally controlled elders may use their external belief as an adaptive mechanism, has problematic implications for the design of LTC facilities. The care offered in institutions is often custodial, not therapeutic and, despite good intentions, a conclusion that externality is adaptive could discourage therapeutic, rehabilitative

approaches within institutions (Fawcett, Stonner, & Zepelin, 1980). Thus, in order to ensure that the needs of elderly individuals in LTC facilities are met, the suggestion that life satisfaction in institutions is based on external LoC in the individual must be approached with great caution if not rejected altogether.

The results of this study support the need for the development of a theoretical model which would serve to advise administrators of LTC facilities of ways to allow residents to maintain control over activities and their lives in general. The elderly individuals participating in this study who reported an internal LoC also resolved the last stage of life positively. The retrospective glances of life among the internal elderly residents yielded an outcome of integrity rather than a negative outcome of despair. These individuals did not exhibit a fear of death or a sense of time urgency, but rather felt an overall satisfaction with life. In short, today's older adults entering the later stages of life may face a long stay in a LTC setting such as a home for adults or nursing home. We, as gerontologists, should ensure that the design of facilities and the therapeutic activities offered meet the requirements of aging adults in a manner that maintains an internal LoC, reduces death anxiety, and results in a satisfying life.

Table 1  
Descriptive Statistics for the Scales

Category	%	M	SD	Reliability*
Mastery Scale		16.26	4.74	.72
External (7-16)	51			
Internal (17-26)	49			
Death Anxiety Scale		3.97	3.00	.77
Low (0-6)	81			
High (7-14)	19			
Morale Scale		10.88	4.12	.85
Low (0-8)	26			
High (9-17)	74			

Note. N = 100

\*Cronbach's Alpha

Table 2

Scale Correlations


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Scale Name	MS <sup>a</sup>	DAS <sup>b</sup>	PGC <sup>c</sup>
MS			
DAS	-.5182*		
PGC	.5790*	-.6820*	

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<sup>a</sup>Mastery Scale

<sup>b</sup>Death Anxiety Scale

<sup>c</sup>Philadelphia Geriatric Center Morale Scale

\* $p < .0001$

## References

- Baum, S., & Boxley, R. (1984). Age denial: Death denial in the elderly. Death Education, 8, 419-423.
- Brown, B., & Granick, S. (1983). Cognitive and psychosocial differences between I and E locus of control aged persons. Experimental Aging Research, 9, 107-110.
- Cicirelli, V. (1987). locus of control and patient role adjustment of the elderly in acute-care hospitals. Psychology and Aging, 2, 138-143.
- Code of Virginia, Title 63.1. (1990). Homes for Aged, infirm, or disabled adults. Richmond, VA: Author.
- Erikson, E. (1950). Childhood and Society. New York: Norton.
- Fawcett, G., Stonner, D., & Zepelin, H. (1980). Locus of control, perceived constraint, and morale among institutionalized aged. International Journal of Aging and Human Development, 11, 13-23.
- Felton, B., & Kahana, E. (1974). Adjustment and situationally-bound locus of control among institutionalized aged. Journal of Gerontology, 29, 295-301.

- Given, J., & Range, L. (1990). Life satisfaction and death anxiety in elderly nursing home and public housing residents. Journal of Applied Gerontology, 9, 224-229.
- Goebel, B., & Boeck, B. (1987). Ego integrity and fear of death: A comparison of institutionalized and independently living older adults. Death Studies, 11, 193-204.
- Grossman, M. (1989). Loneliness among widowed persons in later life. Unpublished doctoral dissertation, Virginia Polytechnic Institute and State University.
- Hyer, L., & Blazer, D. (1982). Depression in long-term care facilities. In D. Blazer (Ed.). Depression in late life. St. Louis: Mosby.
- Hyer, L., Matteson, M., & Siegler, I. (1982). Locus of control and long-term care. Journal of Applied Gerontology, 1, 147-160.
- Janas, M. (1988). Control, introversion, and social support: A model of loneliness in Alzheimer's caregivers. Unpublished doctoral dissertation, Virginia Polytechnic Institute and State University.

- Kahn, R., Goldfarb, A., Pollack, M., & Peck, A. (1960). Brief objective measures for the determination of mental status in the aged. American Journal of Psychiatry, 117, 326-328.
- Kane, R., & Kane, R. (1981). Assessing the elderly: A practical guide to measurement. Lexington, MA: Lexington Books.
- Kuypers, J. (1971). Internal-external locus of control and ego-functioning correlates in the elderly. The Gerontologist, 11, 39.
- Langer, E., & Rodin, J. (1976). The effects of choice and enhanced personal responsibility for the aged: A field experiment in an institutionalized setting. Journal of Personality and Social Psychology, 34, 191-198.
- Lawton, M. (1975). The Philadelphia Geriatric Center Morale Scale: A revision. Journal of Gerontology, 30, 85-89.
- Lohmann, N. (1977). Correlations of life satisfaction, morale and adjustment measures. Journal of Gerontology, 32, 73-75.
- Lumpkin, J. (1986). The relationship between locus of control and age: New evidence. Journal of Social Behavior and Personality, 1, 245-252.

- Mahoney, F., & Barthel, D. (1965). Functional evaluation: The Barthel Index. Maryland State Medical Journal, 14, 61-65.
- Mischel, W. (1968). Personality and Assessment. New York: Wiley.
- Moos, R. (1974). Evaluating treatment environments: A social ecological approach. New York: Wiley.
- Morris, J., & Sherwood, S. (1975). A retesting and modification of the Philadelphia Geriatric Center Morale Scale. Journal of Gerontology, 30, 77-84.
- Nehrke, M., Hulicka, I., & Morganti, J. (1980). Age differences in life satisfaction, locus of control and self-concept. International Journal of Aging and Human Development, 11, 25-33.
- Nirenberg, T. (1983). Relocation of institutionalized elderly. Journal of Consulting and Clinical Psychology, 51, 693-701.
- Palmore, E., & Luikart, C. (1972). Health and social factors related to life satisfaction. Journal of Health and Social Behavior, 13, 68-80.
- Pearlin, L., & Schooler, C. (1978). The structure of coping. Journal of Health and Social Behavior, 19, 2-21.

- Queen, L., & Freitag, C. (1978). A comparison of externality, anxiety and life satisfaction in aged populations. Journal of Psychology, 98, 71-74.
- Reid, D., Haas, G., & Hawkings, D. (1977). Locus of desired control and positive self-concept of the elderly. Journal of Gerontology, 32, 441-450.
- Rotter, J. (1966). Generalized expectancies of internal versus external control of reinforcement. Psychological Monographs, 80, (1 whole No. 609).
- Rotter, J. (1975). Some problems and misconceptions related to the construct of internal versus external control of reinforcement. Journal of Consulting and Clinical Psychology, 43, 56-67.
- Schultz, R. (1976). Effects of control and predictability on the physical and psychological well-being of the institutionalized aged. Journal of Personality and Social Psychology, 33, 563-573.
- Skolnick, B. (1985). The right place at the right time: A guide to long-term care choices. American Association of Retired Persons.
- Strickland, B. (1977). Internal-external control of reinforcement. In T. Blass (Ed.). Personality variables in social behavior. Hillside, NJ: Lawrence Erlbaum.

- Taft, L., & Nehrke, M. (1990). Reminiscence, life review, and ego integrity in nursing home residents. International Journal of Aging and Human Development, 30, 189-196.
- Templer, D. (1970). The construction and validation of a death anxiety scale. The Journal of General Psychology, 82, 165-177.
- Vallerand, R., O'Connor, B., & Blais, M. (1989). Life satisfaction of elderly individuals in regular community housing, in low-cost community housing, and high and low self-determination nursing homes. International Journal of Aging and Human Development, 28, 277-283.
- Walford-Kraemer, P., & Light, H. (1984). Depression and mastery in women: Differences according to personal characteristics. Psychological Reports, 54, 710.
- Wolk, S. (1976). Situational constraint as a moderator of the locus of control-adjustment relationship. Journal of Consulting and Clinical Psychology, 44, 420-427.
- Wolk, S., & Kurtz, J. (1975). Positive adjustment and involvement during aging and expectancy for internal control. Journal of Consulting and Clinical Psychology, 43, 173-178.

- Wolk, S., & Telleen, S. (1976). Psychological and social correlates of life satisfaction as a function of residential constraint. Journal of Gerontology, 31, 89-98.
- Woods, N., & Witte, K. (1981). Life satisfaction, fear of death, and ego identity in elderly adults. Bulletin of the Psychonomic Society, 18, 165-168.

**Appendix A**  
**Human Subjects Review Forms**

Human Subjects Approval Form

CERTIFICATION OF EXEMPTION OF PROJECTS  
INVOLVING HUMAN SUBJECTS

Form A

Principal Investigator(s): Mary Ellen McDonald

Department(s): Family and Child Development

Project Title: INTEGRITY/DESPAIR, LOCUS OF CONTROL, AND LIFE SATISFACTION IN ELDERLY  
RESIDENTS OF HOMES FOR ADULTS

Source of Support: Departmental Research \_\_\_\_\_ Sponsored Research \_\_\_\_\_ Proposal No. \_\_\_\_\_

1. The criteria for "exemption" from review by the IRB for a project involving the use of human subjects and with no risk to the subject is listed below. Please initial all applicable conditions and provide the substantiating statement of protocol.

a. The research will be conducted in established or commonly established educational settings, involving normal education practices. For example:

- 1) Research on regular and special education instructional strategies;
- 2) Research on effectiveness of instructional techniques, curricula or classroom management techniques.

b. The research involves use of education tests ( cognitive, diagnostic, aptitude, achievement), and the subject cannot be identified directly or through identifiers with the information.

c. The research involves survey or interview procedures, in which:

1) Subjects cannot be identified directly or through identifiers with the information;

2) Subject's responses, if known, will not place the subject at risk of criminal or civil liability or be damaging to the subject's financial standing or employability;

3) The research does not deal with sensitive aspects of subject's own behavior (illegal conduct, drug use, sexual behavior or alcohol use);

4) The research involves survey or interview procedures with elected or appointed public officials, or candidates for public office.

d. The research involves the observation of public behavior, in which:

1) The subjects cannot be identified directly or through identifiers;

2) The observations recorded about an individual could not put the subject at risk of criminal or civil liability or be damaging to the subject's financial standing or employability;

3) The research does not deal with sensitive aspects of the subject's behavior (illegal conduct, drug use, sexual behavior or use of alcohol).

e. The research involves collection or study of existing data, documents, recording pathological specimens or diagnostic specimens, of which:

1) The sources are publicly available; or

2) The information is recorded such that the subject cannot be identified directly or indirectly through identifiers.

2. I further certify that the project will not be changed to increase the risk or exceed exempt condition(s) without filing an additional certification or application for use by the Human Subjects Review Board.

Note: If children are in any way at risk while this project is underway, the chairman of IRB should be notified immediately in order to take corrective action.

Mary McDonald 12/11/90  
Principal Investigator(s) Date

\_\_\_\_\_  
Principal Investigator(s) Date

Alicia W. Bird 1/15/91  
Departmental Reviewer Date

[Signature] 1-15-91  
Chair, Institutional Review Board Date



Appendix B  
Scales and Frequency Distributions

\*\*Permission to use published scales was obtained from the editor of the journal in which each scale appeared

\*\*Values in parentheses indicate the number of respondents associated with each alternative (N = 100)

Barthel IndexPoints for performance

	Does not Meet Criteria	Needs Help	Independent
1. Feeding (if food food needs to be cut = help)	0	5	10(100)
2. Moving from wheel- chair to bed (includes sitting up in bed)	0	5-10( 1)	15( 99)
3. Personal toilet (wash face, comb hair, shave, clean teeth)	0	0	5(100)
4. Getting on and off toilet (handling clothes, wipe, flush)	0	5	10(100)
5. Bathing self	0	0(38)	5( 62)
6. Walking on level surface	0	10( 1)	15( 99)
7. Ascend and descend stairs	0	5(10)	10( 89)
8. Dressing (includes tying shoes, fastening fasteners)	0	5( 1)	10( 99)
9. Controlling bowels	0	5	10(100)
10. Controlling bladder	0	5	10(100)

Mental Status Questionnaire (MSQ)

	Correct	Not Correct
1. What is this place?	C( 97)	NC( 3)
2. Where is this place located?	C( 98)	NC( 2)
3. What date in the month is it today?	C( 78)	NC(22)
4. What day of the week is it?	C( 93)	NC( 7)
5. What year is it?	C( 93)	NC( 7)
6. How old are you?	C( 99)	NC( 1)
7. When is your birthday?	C( 99)	NC( 1)
8. In what year were you born?	C(100)	NC( 0)
9. What is the name of the president?	C( 87)	NC(13)
10. Who was the president before this one?	C( 67)	NC(33)

**Mastery Scale**

1= Agree 2= Tend to Agree 3= Tend to Disagree 4= Disagree

1. I have little control over the things that happen to me  
1 (41)      2 (16)      3 (13)      4 (30)
2. There is really no way I can solve some of the problems I have  
1 (44)      2 (15)      3 (11)      4 (30)
3. There is little I can do to change many of the important things in my life  
1 (60)      2 (12)      3 ( 7)      4 (21)
4. I often feel helpless in dealing with the problems of life  
1 (36)      2 (15)      3 ( 3)      4 (46)
5. Sometimes I feel that I'm being pushed around in life  
1 (18)      2 ( 8)      3 ( 2)      4 (72)
- \*6. What happens to me in the future mostly depends on me  
1 (64)      2 (13)      3 ( 7)      4 (16)
- \*7. I can do just about anything I really set my mind to do  
1 (49)      2 (10)      3 (13)      4 (27)

\*Reverse coded

Death Anxiety Scale

	True	False
1. I am very much afraid to die.	T( 8)	F(92)
2. The thought of death seldom enters my mind.	T(57)	F(43)
3. It doesn't make me nervous when people talk about death.	T(84)	F(16)
4. I dread to think about having to have an operation.	T(37)	F(63)
5. I am not at all afraid to die.	T(84)	F(15)
6. I am not particularly afraid of getting cancer.	T(78)	F(22)
7. The thought of death never bothers me.	T(80)	F(20)
8. I am often distressed by the way time flies so very rapidly.	T(41)	F(59)
9. I fear dying a painful death.	T(39)	F(60)
10. The subject of life after death troubles me greatly.	T( 9)	F(90)
11. I am really scared of having a heart attack.	T(15)	F(85)
12. I often think about how short life is.	T(40)	F(60)
13. I shudder when I hear people talking about a World War III.	T(47)	F(52)
14. The sight of a dead body is horrifying to me.	T(13)	F(87)
15. I feel that the future holds nothing for me to fear.	T(68)	F(32)

<u>Philadelphia Geriatric Center Morale Scale</u>	YES	NO
1. Little things bother me more this year.	Y(42)	N(58)
2. I sometimes worry so much that I can't sleep.	Y(22)	N(78)
3. I am afraid of a lot of things.	Y(19)	N(80)
4. I get mad more than I used to.	Y(13)	N(87)
5. I take things hard.	Y(29)	N(71)
6. I get upset easily.	Y(31)	N(69)
7. Things keep getting worse as I get older.	Y(49)	N(49)
8. I have as much pep as I had last year.	Y(65)	N(33)
9. As I get older I am less useful.	Y(70)	N(30)
10. As I get older, things are better or worse than I thought they would be.	W(37)	B(61)
11. I am as happy now as when I was younger.	Y(40)	N(59)
12. I feel lonely not much or much.	NtM(73)	M(27)
13. I see enough of my friends and relatives.	Y(51)	N(49)
14. I sometimes feel that life isn't worth living.	Y(18)	N(81)
15. Life is hard for me much of the time.	Y(24)	N(75)
16. I am satisfied with my life today?	NtS(20)	S(80)
17. I have a lot to be sad about.	Y(28)	N(72)

## Appendix C

### Comparative Data on Scales

### Mastery Scale

Grossman (1989), in a study of 173 elderly widowed persons, reported Cronbach's alpha as .72 for the Mastery Scale. Folkman, Lazarus, Gruen, and DeLongis (1986, cited in Grossman, 1989) in a study of 85 married couples between the ages of 35 and 54 reported internal consistency for the Mastery Scale as .75.

Evidence of construct validity of the Mastery Scale is available from several studies. In a regression analysis of the effects of coping resources on stresses associated with marriage, parenting, finances, and work, Pearlin and Schooler (1978) found that high mastery was associated with lower strain. Janas (1988), in a study of control, introversion, and social support among Alzheimer's caregivers, found a significant correlation between mastery and loneliness ( $r = .47, p < .01$ ), with those high on mastery less lonely than others. Grossman (1989) found similar results ( $r = .20$  for women and  $.54$  for men,  $p < .05$ ). Additionally, Walford-Kraemer and Light (1984) in a study of 416 women between the ages of 21 and 63 reported a statistically significant relationship between mastery and depression scores. High depression scores were associated with low control over life ( $r = .366, p < .0001$ ).

### Death Anxiety Scale

Woods and Witte (1981) in a sample of 100 men and women 61-89 years of age used the DAS as a fear of death measure, and reported the total mean fear of death score as 5.00 (SD = 2.74). Goebel and Boeck (1987), using a sample of 51 older adults ages 70 to 90 and the DAS, reported an internal consistency coefficient of  $\alpha = .78$  and the test-retest coefficient, based on measures taken three weeks apart, as  $r = .66$ .

The DAS scale was used in the Baum and Boxley (1984) study, described earlier, which suggested that elderly individuals with external beliefs tend to have high death anxiety, while elderly individuals with internal beliefs tend to have low death anxiety ( $F=9.69, p<.01$ ). Additionally, Given and Range (1990) used this scale and the PGC scale and found that the individuals in their sample reporting higher life satisfaction also reported lower death anxiety ( $r=-.54, p < .01$ ).

### Philadelphia Geriatric Center Morale Scale

In addition to the Given and Range (1990) findings reported above, previous research with the elderly (see Lohmann, 1977) indicated a high level of correlation among several measures of life satisfaction, adjustment, and morale (including the PGC). The PGC is a widely-used

measure of life satisfaction among elderly individuals.

## VITA

Mary Ellen McDonald was born in Grundy, Virginia on August 8, 1968. After graduating from high school in 1985, she entered the Psychology program at Roanoke College. Immediately upon graduating in 1989, she pursued graduate study at Virginia Polytechnic Institute and State University and in May, 1991, obtained a Master's in Family and Child Development and a Graduate Certificate in Gerontology. Mary McDonald presented a paper, "Growing Old in America: The Role of the Elderly in the Family" at the 12th Annual Meeting of the Southern Gerontological Society, Atlanta, Georgia, March, 1991.

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