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## AGE GROUP AND GENDER DIFFERENCES IN FEARS OF AGING

by
Vicky Tomlin


#### Abstract

A Thesis Submitted in partial fulfillment of the requirements of the Master of Mental Health Counseling and Applied Psychology Degree of The Graduate School at Rowan University 5/3/06


Approved by
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ABSTRACT<br>Vicky C. Tomlin<br>Age Group and Gender Differences in Fears of Aging 2005/06<br>Dr. Mark S. Chapell<br>Mental Health Counseling and Applied Psychology

The purpose of this study is to investigate differences in fears of aging in two age groups ( $M=20$ years and $M=30$ years) and gender differences in fears of aging. Two hundred twenty-two undergraduate ( $n=156$ ) and graduate students ( $n=66$ ) responded to three questionnaires, the Anxiety about Aging Scale (AAS), the Brief Life Satisfaction Scales (BLSS), and an open-ended questionnaire allowing participants to write in their five greatest personal fears of aging. The older age group had significantly higher Anxiety about Aging Psychological Concerns subscale scores. Males scored significantly higher than females in AAS total scores, and males also scored significantly higher than females in three AAS subscale scores, Psychological Concerns, Physical Appearance, and Fear of Losses. For the entire sample, the most common responses on the open-ended top five fears of personal aging questionnaire were health concerns first, followed by personal death, then physical appearance. There were no significant age group differences for any of the five fears of aging, but females rated their personal appearance fears of aging at a rate two to three times higher than males across all five fears of aging.

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## Chapter 1

Introduction
Numerous fears are associated with aging. These fears result from various associations with older adults, personal fears of the aging process or attitudes and stereotypes of older persons (Harris \& Dollinger, 2001; Kafer, Rakowski, Lachman \& Hickey, 1980; Lynch, 2000). The 2004 census states that almost 47 million people are 60 years of age or older in the United States. The 2025 world census projects that more than 833 million people will be 65 or older (U.S. Census Bureau, 2004). With the increased life expectancy and actual longevity of older adults in society, it is important to address these negative attitudes to help change them into more positive attitudes (Harris \& Dollinger, 2001).

In addition to attitudes, the stereotype of the older population in American society is discriminatory. Ageism (Butler, 1975) refers to prejudice and discrimination against older adults and a fear of the aging process. Ageism is similar to racism and sexism except that ageism affects everyone (Palmore, 2001). As an example of negative connotations about aging, a study done by Mosher-Ashley and Ball (1999) found that $30 \%$ of students viewed older adults as narrow-minded. Another study found that students reported older adults as rigid and inflexible (Moeller \& Panek, 1982).

A review done by Carolyn Wilken (2002) discusses the numerous myths associated with aging. Overall, society views aging as the declining phase of life. The first myth she mentions is that senility is a normal part of aging. However, in 2002, of the 35 million American older adults, only 4 million suffered from Alzheimer's disease.

Another myth associated with aging is that most old people are alone and lonely. Wilken found that $80 \%$ of older adults see family members weekly and $50 \%$ see family members daily. Society also associates aging with poor health, when in fact $50 \%$ of the elderly 85 years of age or older are in good or excellent health.

In addition to these myths, Wilken (2002) states that only one in ten of the elderly live in poverty today whereas in 1959 one in three lived in poverty. The myth that older workers are less productive than younger workers has influenced the discrimination towards the elderly. In fact, nearly half of all American businesses employ elderly workers because they are highly motivated and more responsible. Another important misconception is that most old people end up in nursing homes. In fact, only $5 \%$ of older adults live in nursing homes.

Negative attitudes, discrimination and myths all contribute to fears of aging. Therefore, it is important for society to understand specific fears of aging to decrease the negative nuances of aging. By understanding specific fears of aging, and with the help of education, American society can change its negative beliefs about aging and create a better society for everyone and pave the way for the younger generations.

## Chapter 2

## Literature Review

There have been a limited number of studies done on fears of aging, and these have concentrated on investigating two major factors: age group and gender differences. The review below summarizes the empirical literature that has addressed fears of aging in these two areas.

## Age Group Differences in Fears of Aging

Lynch (2000) stated that, "Anxiety about aging has been virtually neglected in extant research, but such anxiety should become increasingly important to understand as the population ages." (p. 533). In order to change negative attitudes and stereotypes of aging we need to know more about the specific fears of aging. Lynch (2000) conducted a large sample study on fears of aging, focusing on age group and gender differences, using the Aging Anxiety Scale (Kafer et al., 1980). The data for Lynch's study are from the 1994 American Association of Retired Persons' (AARP) Images of Aging Survey, in which 1,200 American adults responded to a national random telephone survey. The sample included 538 in the 18-39 year old age group, 216 in the 40-49 age group, 225 in the 50-64 age group, and 170 in the $65+$ age group. This sample included 516 males and 633 females, and there were $83 \%$ White participants and $17 \%$ non-White participants. Lynch found that aging anxiety was highest in young adulthood, held steady across middle age, then continued to decline further in the 50-64 and 65+ age groups.

Studying age groups and fears, researchers have found that different age groups have different attitudes and fears on the topic of aging (Montepare \& Lachman, 1989).

It is easy to understand how generations will differ on their views of a multitude of topics such as politics, finances and style. Subjective age is described as not an individual's chronological age, but the age they feel. Montepare and Lachman (1989) found that discrepancies between subjective and actual age are associated with personal fears of aging. Their study consisted of 188 participants, of which 81 were males aged 14-78, and 106 females 15-83 years old. They were asked to fill out three questionnaires: Subjective Age Identity, the Attitudes Toward Own Aging scale from the Aging Opinion Survey (Kafer et al., 1980) and the Cantril Self-Anchoring Ladder to measure life satisfaction. Results showed that older women had a larger discrepancy between actual and subjective age. Individuals with the oldest age identities had the least personal fears of aging. Men who reported the oldest age identity reported the greatest life satisfaction. In contrast, older women with younger age identities reported the lowest levels of satisfaction and younger women reported greater life satisfaction than older women.

However, chronological age is not to blame, social values and belief systems are the problem (Cohen, 2000). Older adults have more difficulty finding jobs, health insurance and overall, experience negative bias, therefore one may assume that older adults would have more worries about aging. A study done by Chasteen (2000) investigated the role of age-related attitudes in perceptions of the elderly. Younger and older adults were asked to complete a questionnaire measuring their age-related attitude and then were asked to evaluate an elderly individual. A total of 242 adults, 122 young adults ages 18-22, including 59 males and 63 females, and 120 older adults, aged 62-85, including 59 males and 61 females participated in this study. Once the participants completed the attitude questionnaire, they were asked to come back and read a
description of an elderly target. The participants received either a favorable or an unfavorable description and were asked to write down their impressions of the elderly target. They were then questioned to indicate how much they liked that person and how energetic they thought that person was. Younger adults viewed the negative target as more typical of older adults, whereas the older adults viewed the more positive target as more typical of older adults.

Another study had similar results indicating that the older the participants, the more positive they were about personal aging. Kafer et al. (1980), focused on attitudes toward aging and the elderly. They developed the Aging Opinion Survey, based on a multidimensional view of stereotypic age decrement, personal anxiety towards aging and social value of the elderly. Age decrement questions asked about learning ability, work, physical appearance and health with questions like "Based on the people I know, you can't teach an old dog new tricks." Personal anxiety towards aging asked, "I dread the days when I can no longer get around on my own" and an example of questions of the social value of the elderly asked, "Community organizations would function more smoothly if older persons were included on their governing boards." All questions used a 5-point Likert format $1=$ "strongly agree" to $5=$ "strongly disagree." Participants were made up of 118 gerontology practitioners ( 99 female, 19 male) and 102 undergraduate students ( 59 female, 43 male). There was a positive correlation between age and the scale score indicating that anxiety toward personal aging decreased among the older participants. Results also showed that practitioners were slightly more positive than the students were and overall males had a more negative attitude towards aging than females.

In addition to age perception, McConatha, Hayta, Rieser-Danner, McConatha \& Polat (2004) used participants from Turkey and the United States to compare attitudes and anxieties toward aging. The participants were placed according to age in the young adult (ages 18-25) or middle adult (ages 25-58) groups. Although there were no significant interactions or main effects for age group, the perception of old age was interesting. Young adults from both countries considered themselves old at a younger age than the middle-aged adults. In addition, the American participants considered themselves old at a later age than the Turkish participants, who viewed themselves old at a younger age.

A study done by Stein (1995) hypothesized that age groups would differ in their fears of aging on biological, psychological and social levels. A questionnaire was completed by 509 Canadian participants who were divided into the following three age groups: $20-30$ yrs. ( $n=204$ ), $40-59$ yrs. ( $n=152$ ) and $60+$ yrs. ( $n=153$ ). The questionnaire consisted of fears involving health, appearance, finance, social and miscellaneous fears. The question in each section was rated on a scale from very often to never, or vice versa. In addition to the frequency, how strongly they felt each fear was also measured.

A question involving health asked, "Is your health worse now than ten years ago?" and an example of an appearance question asked, "During the past year, have you worried about changes in physical appearance due to aging?" Results indicated that age groups one (20-30) and three ( $60+$ ) scored significantly differently in the majority of fears.

For example, the youngest age group feared more responsibility whereas the older group feared deteriorating health. What was surprising was that the older group scored higher in the majority of fears.

Finally, Lasher and Faulkender (1993) developed the Anxiety about Aging Scale (AAS). This scale looked at overall anxiety of aging and included four subscales: Fear of Old People, Psychological Concerns, Physical Appearance and Fear of Losses. They defined fear of aging as the fear associated with the process of one's personal aging. Their study consisted of 312 participants, 121 males and 191 females, grouped into age groups including below 25 years, 25-34, 35-44, 45-54, 55-64, 65-74, and over 74. There were no significant differences in AAS total scores among these age groups.

## Gender Differences in Fears of Aging

There has been some research investigating gender differences in fears of aging. Some studies discuss how different genders view the aging process and are at times consistent with the various stereotypes discussed previously. Snyder and Miene (1994) found that photographs of middle aged and older women had fewer positive stereotypes than middle aged and older males. Keeping up with societies need to stay young looking, a study found that young facial features were associated with more positive traits and behaviors than those with older facial features (Hummert, Garstka \& Shaner, 1997). Participants in that study had fewer positive stereotypes of women then men. In addition, Hawkins (1996) found that male students viewed older females more negatively than older males. A study on the social value of the elderly found that females were more neutral then the men who more negative (Kafer et al., 1980).

McConatha et al. (2004) compared attitudes and anxieties toward aging of young and middle aged adults. The participants consisted of 334 adults from Turkey and the United States. The Turkish participants consisted of 174 individuals, 122 ( 79 females and 67 males) were in the young group (ages 18-25) and 52 ( 24 females and 28 males) were
in the older group (ages 26-58). The participants were asked to fill out the AAS to compare fear and anxiety about aging. There were no significant effects for age group, however males reported higher levels of Fear of Old People, and females had higher concerns about Physical Appearance.

In the Stein (1995) study cited above, there were three gender differences found with specific fears: possible death of close relative, changes in physical appearance and lacking control over changes in appearance. The possible death of a close relative was represented by the following question, "During the past year, have you been concerned, that as you age, your close relatives may possibly die?" "During the past year, have you felt apprehensive about not having control over age related changes in the way you look," was representative of questions about lacking control over changes in appearance. Not only did women have these fears more frequently than men did, the level of fear measured was much higher as well. Women also feared the limitations that age imposes on having children, whereas men did not have high concerns for this fear.

Another study found that non-elderly women face their own aging with higher anxiety than non-elderly men (Cummings, Kropf \& DeWeaver, 2000). This study questioned 884 non-elderly participants ( 467 female and 417 male), ages 18 through 55. Participants were asked to complete the Palmore Facts on Aging Quiz (FAQ) and the Kafer Anxiety Scale (KAS). The females faced their own aging process with a greater degree of anxiety than males. In the study by Lynch (2000) described above, which included a total of 516 males and 633 females, Lynch found that women had higher overall anxiety of aging than males, but only in the youngest 18-39 age group, and not in any other group (Lynch, 2000). Finally, Lasher and Faulkender (1993) examined gender
differences in fears of aging in 121 males and 191 females, and they reported that males scored significantly higher than females on Anxiety about Aging total scores.

To summarize, as reviewed above, the empirical literature on fears of aging is very limited, and has concentrated on investigating fears of aging in different age groups and gender differences in fears of aging. The main purpose of this current study was to add to this literature by investigating differences in fears of aging in younger and older age groups and across gender. This study employed quantitative questionnaires, but it was one of the first to add a qualitative open-ended measure allowing participants to identify their top fears of aging in their own words, and it is hoped that this combination of quantitative and qualitative measures provided a more complete view of fears of aging across age groups and gender.

## Chapter 3

## Method

## Participants

A total of 222 undergraduate ( $n=156$ ) and graduate ( $n=66$ ) students from a large Eastern university volunteered to participate in this study. The participants consisted of 133 females ( 90 undergraduate, 43 graduate) and 89 males ( 66 undergraduate, 23 graduate). The ethnicity of the participants was: African American ( $n=12 ; 5.4 \%$ ), Asian American $(n=8 ; 3.6 \%)$, European American ( $n=180 ; 81 \%$ ), Hispanic American ( $n=6$; 2.7\%), Native American ( $n=1, .45 \%$ ), multiethnic ( $n=10 ; 4.5 \%$ ) and international students ( $n=5 ; 2.2 \%$ ).

## Materials

The participants were asked to self-report using three different questionnaires. The Anxiety about Aging Scale (Lasher \& Faulkender, 1993) consists of a 20-item measure that produces a total score based on the answers to all 20 questions, and four subscale scores: 1) Fear of Old People (items 1, 3, 10, 13, 19); 2) Psychological Concerns (items 5, 7, 11, 16, 18); 3) Physical Appearance (items 4, 9, 12, 15, 20); and 4) Fear of Losses (items $2,6,8,14,17$ ), (see Appendix C). An example of the Fear of Old People subscale is: "I enjoy being around old people." "I expect to feel good about life when I am old," is an item in the Psychological Concerns subscale. An example of the Physical Appearance subscale is the item: "I have never lied about my age in order to appear younger." An example of the Fear of Losses subscale is the item: "I fear that when I am old all my friends will be gone." Each question is answered by using a five-point

Likert scale ranging from $1=$ Strongly Disagree to $5=$ Strongly Agree. Lasher and Faulkender (1993) reported that the 20 -item AAS has a Cronbach reliability of alpha $=$ . 82.

Lubin and Van Whitlock (2004) developed the Brief Life Satisfaction Scales (BLSS). This 10-item questionnaire produces a total score based on the answers to all 10 questions, and three subscale scores: Self-Satisfaction (items 3, 4, 9, 10), Interpersonal Satisfaction (items 5, 6, 8), and Social Role Satisfaction (items 7, 2), (see Appendix B). The questions are scored using a 5 -point scale with $1=$ very dissatisfied and $5=$ very satisfied. Lubin and Van Whitlock (2004) reported that the 10 -item BLSS has high internal consistency (Cronbach alpha $=.88$ ). Lubin and Van Whitlock (2004) found that the elderly had significantly higher total BLSS scores and also significantly higher Interpersonal Satisfaction subscale scores than college students. In addition, females had significantly higher Interpersonal Satisfaction subscale scores than males.

In addition to the AAS and the BLSS, an open-ended questionnaire was added in order to allow participants to write in their own personal fears of aging. Participants were asked to list their top five fears of aging from most to least important. The data collected were grouped into the following eight categories: 1) personal death; 2) death of loved ones; 3) health concerns; 4) dependency; 5) isolation; 6) financial concerns; 7) personal appearance; and 8) other.

## Design and Procedure

Participants were asked to fill out questionnaires during class time. None of the students who participated dropped out or declined to participate once informed consent was given. To test age group differences in fears of aging, two age groups were formed:
students who were 18-22 ( $n=122 ; M=20$ years), and students 23 and older, age range 23-53, ( $n=100 ; M=30$ years).

## Chapter 4

## Results

The descriptive statistics, the means, standard deviations, ranges and Ns for each quantitative variable are presented in Table 1. These include age, AAS total and four subscale scores (Fear of Old People, Psychological Concerns, Physical Appearance and Fear of Losses), and BLSS total scores and three subscale scores (Self-Satisfaction, Social Role Satisfaction, and Interpersonal Satisfaction).

A correlation matrix (see Table 2), is presented to indicate significant relationships among the variables. One of the more interesting results shown in this table is the .34 positive correlation, significant at the $p<.001$ level, between BLSS total scores and AAS total scores.

A MANOVA of the two age groups on the AAS total and 4 subscales was found to be significant, $F(5,216)=p<.01$, using the Wilk's Lambda Criterion. The only statistically significant subscale difference was in Psychological Concerns subscale scores, in which the older age group scored significantly higher than the younger group, with a univariate ANOVA of $F(1,220)=5.84, p<.05$. A MANOVA revealed no significant differences in BLSS total and 3 subscale scores between the two age groups.

There was a significant gender difference in AAS total and 4 subscales, $F(5,216)$, $p<.00001$, using the Wilk's Lambda Criterion. Univariate ANOVAs showed that males scored higher than females in total anxiety, $F(1,220)=9.96, p<.01$, the Psychological Concerns, $F(1,220)=4.21, p<.05$, Physical Appearance, $F(1,220)=17.91, p<.0001$,
and Fear of Losses subscales, $F(1,220)=10.29, p<.01$. A MANOVA revealed no significant differences in BLSS total and 3 subscale scores between the two genders.

In the open-ended measure of the top five fears of personal aging (see Table 3), the most common first fear of aging for the full sample of 222 participants was health concerns ( $33 \%$ ), followed by personal death (28\%), personal appearance (14\%), other ( $6.8 \%$ ), dependency ( $5.4 \%$ ), death of loved ones ( $4.5 \%$ ), financial concerns ( $4.5 \%$ ), and isolation (4.1\%). The second fear of aging showed similar results with health concerns most common at ( $37 \%$ ), personal death (14\%), and personal appearance (13.1\%). The third fear of aging differed slightly with health concerns (30\%) the most common fear, followed by personal appearance ( $16.7 \%$ ) and personal death ( $16.2 \%$ ). The most common fourth fear of aging was also health concerns (30\%), followed by personal death $(20 \%)$, and the fifth fear of aging showed personal death (32\%), followed by personal appearance (19\%). It was surprising to find that death of loved ones had one of the lowest percentages across all five fears of aging for the entire sample, whereas health concerns, personal death and personal appearance were consistently high across the five responses. This could be a result of the relative youth of this sample and that the death of loved ones might not occur for many years.

Chi-Squared analyses of the two age groups revealed no significant differences in the top five fears of aging. Chi-squared analyses of gender differences in the top five fears of aging revealed a significant difference only in the fourth fear of aging, $\chi 2(7,222)$ $=29.34, p<.0001$, with women scoring higher than males.

Although there were no statistically significant differences between the age groups (see Table 4) on the top five fears of aging, the results proved interesting.

Health concerns were the most common fear of aging in both age groups, and in only the fifth fear for the younger group was personal appearance a higher fear than health concerns. The older group had personal appearance as a close second to health concerns for the fifth fear. Fear of personal death was listed after health concerns only for the first fear for both age groups.

There were some interesting gender differences in the open-ended fears of aging responses (see Table 5). Females had higher health concerns than males, and substantially higher personal appearance fears of aging than males, with females describing their personal appearance fears at a rate two to three times higher than males across all five fears of aging.

## Chapter 5

## Discussion

The principal purpose of this study was to investigate the differences in fears of aging in two age groups and across gender. There was only one statistically significant difference between the age groups and that involved the Psychological Concerns subscale of the AAS, in which the older age group scored significantly higher than the younger group. The items in this subscale concern the ability to make a positive adjustment to aging, and as Lasher and Faulkender (1993) stated, "...all are directly related to Erikson's proposed psychosocial conflict of 'integrity versus despair'" (p. 257), the final of the eight stages of ego identity development Erikson proposed. This result suggests that there may be different levels of Psychological Concerns in different age groups across the lifespan. However, it is important to note here that the main limitation of this cross-sectional study is that it included only two age groups with an average age of 20 and 30 years, unlike the cross-sectional study by Lasher and Faulkender (1993), which had age groups which covered all the decades of the lifespan.

There were substantial gender differences in AAS scores, with males scoring higher than females in total anxiety and three subscale scores, including Psychological Concerns, Physical Appearance, and Fear of Losses. This result is consistent with the findings of Lasher and Faulkender (1993), who also reported that males had significantly higher AAS total scores, but the fact that males scored higher than females on the Physical Appearance subscale is an unusual finding that has not been previously reported. This however, is contradicted by the qualitative measure of the five open-ended questions
in which females consistently had higher fears of personal appearance aging than males. Males rated health concerns as their main fear of aging, followed by personal death, and personal appearance a distant third. Female participants also rated health concerns first, then personal death, but personal appearance was a consistently more important fear of aging in females than in males, consistent with the findings of the study by Stein (1995) reviewed above.

Society has focused on health concerns as a major focus on the aging process. This study has revealed that women are almost as worried about their physical appearance as they are about their health. This may prove to be an area of concern, especially since there has been an increase in eating disorders in middle-aged and older adult women (Lewis \& Cachlein, 2001; Zerbe, 2003)

Society has stressed the appeal of looking young, especially for women. The commercials on television and advertisements in magazines show numerous sales for dieting and lotions for younger looking skin. Researchers have been studying how these societal images affect body image. Thus, for instance, Lewis and Cachelin (2001) studied body image, dissatisfaction and eating attitudes of adult and elderly women and found a relationship among fear of aging and drive for thinness, body dissatisfaction, and disinhibited eating. In addition, those who reported more disordered eating also reported greater fear of aging.

The lifespan approach to aging focuses on aging well. Education is the primary tool that will assist society in decreasing fears of aging. A study conducted by Neikrug (1998) focused on a middle-aged and elderly population's knowledge of aging and anxiety about the future. Results indicated that the middle-aged and older adults who had
greater knowledge about the aging process had lower levels of anxiety and fear toward aging. Dorfman, Murty, Ingram, Evans and Power (2004) conducted a study with 59 college students investigating the effects of intergenerational service-learning, i.e., college students earned Fieldwork in Gerontology credit by working for a semester in a nursing home, an assisted living facility and a semi-independent apartment site. There were five cohorts in this study, but only the first cohort showed a significant drop in fear from the beginning of the study to the end of the study to the question "I fear getting old". Compared to pretest scores, there was a significant increase in posttest scores in positive attitudes toward the elderly in the entire sample. This pattern of results suggests that educational experiences for young persons may also be useful in lowering fears of aging.

Further research needs to be done on fears of aging. Lynch (2000) has apparently conducted the only study which focused on comparing fears of aging in different ethnic groups. Lynch reported that 204 non-White participants had significantly higher levels of anxiety about aging than did the 996 White participants. Large scale studies are needed to investigate ethnic group differences in fears of aging in men and women from the American ethnic groups, including European Americans, Hispanic Americans, African Americans, Asian Americans, Native Americans, and multiethnic Americans.

All the studies of age group and gender differences in fears of aging described above are cross-sectional studies, and there appear to have been no longitudinal studies of fears of aging. Thus, for instance, it was found in this cross-sectional study that the older age group scored significantly higher than the young group on the Psychological Concerns subscale of the AAS, but could this not be due to a cohort effect? Only a
longitudinal study which can track the development of fears of aging in a group over time can answer that question.

In conclusion, this study investigated fears of aging across two age groups and gender in a sample of participants who were in late adolescence and early adulthood. There were limited differences in fears of aging among the two age groups, but there were some significant gender differences in fears of aging, as male participants had significantly higher AAS total scores than female participants, and males also had significantly higher scores than females in three AAS subscale scores, Psychological Concerns, Physical Appearance, and Fear of Losses. Across the entire sample, the most common responses on the open-ended top five fears of personal aging questionnaire were health concerns, followed by personal death and personal appearance.

Changing the media focus on aging would be very influential on society. Media should stop displaying aging as negative and focus on how aging can be a positive phase of life that should be embraced and supported by society. Daniel (1994) has described a movement called "conscious aging," that is aimed at doing just that, changing the perception of a youth obsessed America toward one where there is less fear of aging, less denial of aging, and a greater appreciation for the life experience that comes with aging. As the baby boomer generation ages in America, and the U.S. Census Bureau (2004) projects that the number of senior citizens ( 65 and older) will increase from $12 \%$ in 2000 to $20 \%$ in 2030, it is hoped that Americans will come to better terms with aging.

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Table 1
Descriptive Statistics

| Variable | Mean | SD | Range | $N$ |
| :--- | :---: | :--- | :---: | :---: |
| Age | 24.46 | 6.64 | $18-53$ | 222 |
| Brief Life Satisfaction Scales Total | 39.09 | 5.38 | $18-50$ | 222 |
| Self-Satisfaction | 15.88 | 2.50 | $6-20$ | 222 |
| Social Role Satisfaction | 7.45 | 1.48 | $3-10$ | 222 |
| Interpersonal Satisfaction | 11.74 | 2.15 | $1-15$ | 222 |
| Anxiety about Aging Scale Total | 66.64 | 8.37 | $43-90$ | 222 |
| Fear of Old People | 18.26 | 3.24 | $8-25$ | 222 |
| Psychological Concerns | 18.19 | 3.21 | $5-25$ | 222 |
| Physical Appearance | 15.73 | 3.58 | $6-46$ | 222 |
| Fear of Losses | 14.59 | 3.29 | $5-24$ | 222 |

Table 2
Intercorrelations for Age, Brief Life Satisfaction Scales Scores, and Anxiety about Aging Scores

| Variables | Age | BLSSTOT | SELF | ROLE | INTER | ANXTOT | FOOP | PSY | PHY | FOOL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Age | --- | . 06 | . 09 | . 08 | -. 01 | . 10 | . 13 | .14* | -. 02 | -. 03 |
| BLSSTOT |  | --- | .89*** | .74*** | .69*** | .34*** | . $27 * * *$ | .37*** | . 09 | .17** |
| SELF |  |  | --- | . $59 * * *$ | . $44^{* * *}$ | $.30 * * *$ | . 20 ** | .33*** | . 07 | .18** |
| ROLE |  |  |  | --- | . 31 *** | .17** | .19** | .20** | -. 01 | . 07 |
| INTER |  |  |  |  | --- | .25*** | .27*** | .27*** | . 11 | . 04 |
| ANXTOT |  |  |  |  |  | --- | .57*** | .81*** | .53*** | .60*** |
| FOOP |  |  |  |  |  |  | --- | .28*** | .22*** | -. 08 |
| PSY |  |  |  |  |  |  |  | --- | $.27^{* * *}$ | . $49 * * *$ |
| PHY |  |  |  |  |  |  |  |  | --- | . 12 |
| FOOL |  |  |  |  |  |  |  |  |  | --- |

*p $<.05,{ }^{* *} \mathrm{p}<.01,{ }^{* * *} \mathrm{p}<.001$
Note. BLSSTOT = BLSS Total, SELF = Self-Satisfaction, ROLE= Social Role Satisfaction, INTER = Interpersonal Satisfaction, ANXTOT $=$ AAS Total, FOOP $=$ Fear of Old People, PSY $=$ Psychological Concerns, $\mathrm{PHY}=$ Physical Appearance, FOOL $=$ Fear of Losses.

Table 3
Total Sample Responses to First, Second, Third, Fourth, and Fifth Fears of Aging

| Category | First |  | Second |  | Third |  | Fourth | Fifth |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
|  | $N$ | $\%$ | $N$ | $\%$ | $N$ | $\%$ | $N$ | $\%$ | $N$ | $\%$ |
| Personal death | 63 | 28.0 | 32 | 14.4 | 36 | 16.2 | 44 | 19.8 | 71 | 32.0 |
| Death of loved ones | 10 | 4.5 | 19 | 8.6 | 11 | 5.0 | 11 | 5.0 | 13 | 5.9 |
| Health concerns | 72 | 32.5 | 83 | 37.4 | 67 | 30.2 | 66 | 29.7 | 37 | 16.7 |
| Dependency | 12 | 5.4 | 11 | 5.0 | 8 | 3.6 | 8 | 3.6 | 11 | 5.0 |
| Isolation | 9 | 4.1 | 10 | 4.5 | 10 | 4.5 | 14 | 6.3 | 13 | 5.9 |
| Financial concerns | 10 | 4.5 | 14 | 6.3 | 17 | 7.7 | 20 | 9.0 | 11 | 5.0 |
| Personal appearance | 31 | 14.0 | 29 | 13.1 | 37 | 16.7 | 27 | 12.2 | 41 | 18.5 |
| Other | 15 | 6.8 | 24 | 10.8 | 36 | 16.2 | 32 | 14.4 | 25 | 11.3 |
|  | 222 |  | 222 |  | 222 |  | 222 |  | 222 |  |

Table 4
Age Groups and Fears of Aging

|  | Younger |  |  |  |  |  |  |  |  |  | Older |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Fear | First |  | Second |  | Third |  | Fourth |  | Fifth |  | First |  | Second |  | Third |  | Fourth |  | Fifth |  |
|  | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% |
| Personal death | 30 | 25 | 3 | 3 | 4 | 4 | 2 | 2 | 12 | 13 | 20 | 21 | 4 | 4 | 3 | 3 | 1 | 1 | 3 | 4 |
| Loss of loved ones | 8 | 6 | 9 | 8 | 5 | 4 | 7 | 7 | 8 | 8 | 2 | 2 | 10 | 10 | 6 | 6 | 4 | 5 | 5 | 6 |
| Health concerns | 39 | 32 | 50 | 42 | 42 | 37 | 38 | 37 | 20 | 21 | 34 | 35 | 41 | 42 | 32 | 34 | 31 | 36 | 19 | 25 |
| Dependence | 3 | 2 | 8 | 7 | 6 | 5 | 6 | 6 | 8 | 8 | 9 | 9 | 8 | 8 | 7 | 8 | 6 | 7 | 8 | 10 |
| Isolation | 8 | 7 | 2 | 2 | 4 | 4 | 6 | 6 | 6 | 6 | 4 | 4 | 8 | 8 | 6 | 6 | 8 | 9 | 7 | 9 |
| Financial concerns | 8 | 7 | 8 | 7 | 8 | 7 | 12 | 12 | 7 | 7 | 2 | 2 | 7 | 7 | 9 | 10 | 8 | 9 | 4 | 5 |
| Personal appearance |  | 13 |  | 16 |  | 19 | 14 | 13 | 25 | 26 | 15 | 15 | 11 | 11 | 15 | 16 | 14 | 16 | 16 | 21 |
| Other |  | 7 |  | 17 | 22 | 19 | 19 | 18 |  | 10 |  | 10 | 7 | 7 | 15 | 16 | 15 | 17 | 15 | 19 |

Table 5
Gender and Fears of Aging

|  | Females |  |  |  |  |  |  |  |  |  | Males |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Fear | First |  | Second |  | Third |  | Fourth |  | Fifth |  | First |  | Second |  | Third |  | Fourth |  | Fifth |  |
|  | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% | $N$ | \% |
| Personal death | 30 | 24 | 3 | 2 | 4 | 3 | 2 | 2 | 9 | 8 | 20 | 23 | 4 | 5 | 3 | 4 | 1 | 1 | 6 | 10 |
| Loss of loved ones | 6 | 5 | 14 | 12 | 6 | 5 | 3 | 3 | 10 | 9 | 4 | 5 | 5 | 7 | 5 | 7 | 8 | 11 | 3 | 5 |
| Health concerns | 42 | 34 | 44 | 36 | 40 | 34 | 38 | 35 | 21 |  | 30 | 35 | 39 | 51 | 27 | 36 | 28 | 39 | 16 | 27 |
| Dependence | 7 | 6 | 8 | 7 | 5 | 4 | 5 | 5 | 10 | 9 | 5 | 6 | 3 | 4 | 3 | 4 | 3 | 4 | 1 | 1 |
| Isolation | 6 | 5 | 8 | 7 | 7 | 6 | 13 | 12 | 7 | 7 | 3 | 3 | 2 | 3 | 3 | 4 | 1 | 1 | 6 | 10 |
| Financial concerns | 4 | 3 | 6 | 5 | 11 | 9 | 7 | 6 | 5 | 5 | 6 | 7 | 8 | 11 | 6 | 8 | 13 | 18 | 6 | 10 |
| Personal appearance | 21 | 17 | 22 | 18 | 26 | 22 | 25 | 23 |  | 27 | 10 | 12 | 7 | 9 | 11 | 14 | 2 | 3 | 12 | 20 |
| Other | 7 | 6 | 16 | 13 | 18 | 15 | 17 | 15 | 15 | 14 | 8 | 9 | 8 | 11 | 18 | 24 | 15 | 21 | 10 | 17 |

Appendix A
Informed Consent Sheet

## Informed Consent Form

I agree to participate in a study entitled "Fears about Aging in Different Age Groups," which is being conducted by Vicky Tomlin, under the supervision of Dr. Mark Chapell of the Department of Psychology at Rowan University. I am a graduate student in the Mental Health Counseling Master's Program at Rowan, and this study is my master's thesis research project.

The main purpose of this study is to compare differences in fears of aging in several age groups. I understand that I will be required to complete questionnaires including questions about age, gender, ethnicity, and level of school (undergraduate/graduate), a fill-in-the-blank question listing my top 5 fears of aging, the 10 -item Brief Life Satisfaction Scales, and the 20 -item Anxiety about Aging Scale, which will take about 15-20 minutes to complete. The data collected in this study will be submitted for presentation at a conference and for publication in a research journal.

I understand that my responses will be anonymous and that all the data gathered will be confidential. I agree that any information obtained from this study may be used in any way thought best for publication or education provided that I am in no way identified and my name is not used.

I understand that there are no physical or psychological risks involved in this study, and that I am free to withdraw my participation at any time without penalty.

I understand that my participation does not imply employment with the state of New Jersey, Rowan University, the principal investigator, or any other project facilitator.

If I have any questions or problems concerning my participation in this study I may contact Vicky Tomlin at (856) 498-3276 or by e-mail at Tomlin75@students.rowan.edu or Dr. Chapell at (856) 256-4500/ext. 3171 or by e-mail at chapell@rowan.edu
(Signature of Participant)
(Signature of Investigator)
(Date)
(Date)

Appendix B
Demographic Questions, 5 Fears of Aging, and Brief Life Satisfaction Scales

1. Age $\qquad$ (years)
2. Male $\qquad$ Female $\qquad$
3. Write in the number that gives the best answer to the question:

My ethnicity is $\qquad$
(1) African American
(2) Asian American
(3) European American (White, not Hispanic)
(4) Hispanic American
(5) Native American
(6) Parents are from different groups (please use 2 or more numbers)
(7) International student
4. Undergraduate student $\qquad$ Graduate student $\qquad$
5. Please write your top 5 fears of personal aging, from most (a) to least important (e):
a) $\qquad$
b)
c)
d)
e)

Instructions: Please circle the number before each scale that indicates how satisfied you are about that area of life. Use the following scale as a guide for your responses:

## $1=$ Very $\quad 2=$ Dissatisfied $\quad 3=$ Neither Satisfied $\quad 4=$ Satisfied $\quad 5=$ Very Dissatisfied Nor Dissatisfied Satisfied

12345 1. Most things in general
12345 2. How things are going for you at work or school
12345 3. Your accomplishments
12345 4. Yourself
12345 5. Your friends
12345 6. Your family life
12345 7. Your relationships with supervisors or teachers
12345 8. Where you live
12345 9. Your health
12345 10. How the future looks for you

## Appendix C

The Anxiety about Aging Scale

## The Anxiety about Aging Scale

Instructions: Please indicate how much you agree or disagree with the following 20 statements, using the following scale as a guide for your responses:

## 1 = Strongly Agree

2 = Agree
3 = Neither Agree nor Disagree
4 = Disagree
5 = Strongly Disagree
$\qquad$ 1. I enjoy being around old people.
$\qquad$ 2. I fear that when I am old all my friends will be gone.
_ 3. I like to go visit my older relatives.
$\qquad$ 4. I have never lied about my age in order to appear younger.
5. I fear it will be very hard for me to find contentment in old age.
$\qquad$ 6. The older I become, the more I worry about my health.
$\qquad$ 7. I will have plenty to occupy my time when I am old.
$\qquad$ 8. I get nervous when I think about someone else making decisions for me when I am old.
$\qquad$ 9. It doesn't bother me at all to imagine myself as being old.
$\qquad$ 10. I enjoy talking with old people.
11. I expect to feel good about life when I am old.
12. I have never dreaded the day I would look in the mirror and see gray hairs.
$\qquad$ 13. I feel very comfortable when I am around an old person.
$\qquad$ 14. I worry that people will ignore me when I am old.
15. I have never dreaded looking old.
16. I believe that I will still be able to do most things for myself when I am old.
$\qquad$ 17. I am afraid that there will be no meaning in life when I am old.
18. I expect to feel good about myself when I am old.
19. I enjoy doing things for old people.
20. When I look in the mirror, it bothers me to see how my looks have changed with age.

