

# Life Satisfaction After Spousal Loss: The Potential Influence of Age, Gender, and Leisure

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*Life satisfaction is considered an important part of successful aging. The purpose of this study was to examine how age, gender, and participation in leisure activities influence the life satisfaction of widowed older adults. Results suggest that age, gender, and changes in physical activity participation are possible predictors of widowed older adults' life satisfaction. Implications for practice and suggestions for future research are discussed.*

*Keywords:* gender, leisure activities, life satisfaction, older adults, widowhood

The older population in the United States is on the rise. It is projected that by 2040, there will be close to 80 million older adults in the U.S. and older adults will make up 20% of the total population (Administration on Aging, 2010). Not only is the older population on the rise, but are also living longer (Aldwin & Gilmer, 2013). Because the U.S. population is rapidly aging, it is important to understand adult development in later years and what might impact later adult life satisfaction, since life satisfaction is considered an essential part of successful aging (Collette, 1984; Stevens-Ratchford, 2011).

Older adults experience many gains and losses that require some levels of adjustment. One of the social changes considered as a loss requiring adjustment is the loss of a spouse. Life events such as becoming widowed can lead to experiences of isolation, anxiety, despair, depression, and overall lack of life satisfaction (Lee & DeMaris, 2007; Onrust & Cuijpers, 2006). There are, however, many factors, such as social support, leisure participation, and engagement in physical activities, that can help to sustain older adults' well-being (Tomas,

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Sancho, Gutierrez, & Galiana, 2014). The literature indicates that well-being is integrally related to successful aging (Aldwin & Gilmer, 2013) because both continued overall health and continued well-being provide the bases for high functioning and continued engagement with life components. Life events such as the loss of a spouse can affect older adults' engagement with life (Hao, 2008; Morrow-Howell, Hong, & Tang, 2009). In turn, the loss of a spouse can adversely affect life satisfaction and, therefore, successful aging (Lucas, Clark, Georgellis, & Diener, 2003; van Baarsen, & van Groenou, 2001).

## **LITERATURE REVIEW**

Life satisfaction, a primary factor of subjective well-being (Diener, Suh, Lucas, & Smith, 1999; Ranzijn & Luszcz, 2000) and an important part of optimal and successful aging (Collette, 1984; Stevens-Ratchford, 2011) is an overall assessment of feelings about life fulfillment and life contentment, and includes evaluative attitudes about people at a particular time in their lives (Stevens-Ratchford, 2011). Life satisfaction has been found to be remarkably stable during early and middle adulthood (Diener et al., 1999; Mroczek & Spiro, 2005), yet tends to decline in older adulthood (Gerstorf et al., 2008). Such a pattern may resemble traditional life span development with an increase in skills, knowledge, and experience throughout childhood, adolescence, and young adulthood, followed by stability in middle adulthood, and a decrease in older adulthood (Gomez, Grob, & Orth, 2013). Gomez et al. (2013) conducted a cross-sectional study of past, present, and future life satisfaction perceptions across the entire life span. Their sample consisted of 256 young adults, 244 middle-age adults, and 266 older adults (Gomez et al., 2013). Life satisfaction perception across the life span in each of the three age groups followed a similar trajectory: high level of life satisfaction in childhood, decline in reported life satisfaction during adolescence, improved satisfaction during the middle adulthood, and steady decline of life satisfaction for the future (Gomez et al., 2013). Given the documented decline in life satisfaction as one gets older, age at time of spousal loss may influence the widowed older adult's life satisfaction level; therefore, it was added as a variable for this study. Decline of life satisfaction might also be due to many other factors, one of which may be widowhood.

### **Widowhood in Older Adulthood**

Disruption in marital status (e.g., divorce or death of a spouse) may have adverse effects on health, well-being, and life satisfaction. When it comes to widowhood, researchers have provided mixed results regarding the effects of widowhood on life satisfaction (Aldwin & Gilmore, 2013). Losing a loved one is considered to be a significant loss that can adversely affect the surviving spouse (Holmes-Rahe, 1967). Holmes and Rahe (1967) noted widowhood as being

one of the two most stressful life events in adulthood. Widowhood tends to put individuals at a greater risk for declining health (Williams, 2004), depression (Lee & DeMaris, 2007), despair and distress (Onrust & Cuijpers, 2006), alcohol abuse (Harwood, 2005), higher rates for institutionalization (Elwert & Christakis, 2008), and decreased income (American Association of Retired Persons, 2012). Widowhood may lead to decreased social participation because of isolating factors such as depression, or because a deceased spouse may have facilitated engagement in social activities. On the other hand, Bonanno et al. (2002) suggested that after some period of adjustment to a major loss, life satisfaction of older adults improves with time. Conversely, some researchers (e.g., Lucas et al., 2003; van Baarsen & van Groenou, 2001) have suggested that the adjustment to loss and return to preloss levels of life satisfaction might take up to 8 years for widowed older adults, and that some of them will form a new baseline (Lucas et al., 2003; van Baarsen & van Groenou, 2001). Such differences in adjustment to widowhood may be influenced by gender.

### **Gender**

In addition to marital status, gender seems to be one of the strongest predictors of life expectancy, with women living approximately 5 years longer than men (Aldwin & Gilmer, 2013; Administration on Aging, 2010). Men tend to become widowed at a later age than women and stay widowed for a shorter period of time as they usually remarry (Aldwin & Gilmer, 2013). Harvard Men's Health Watch (2010) reported an increase in mortality within the first year of widowhood, with men twice as likely to die as women within the first 6 to 12 months of the death of their spouse. Social involvement and physical engagement play a crucial role in handling transition to widowhood, and therefore influence life satisfaction.

### **Physical Leisure Participation**

Leisure participation in earlier adulthood has been established as a predictor of late-life participation (Stevens-Ratchford, 2011). Physical activity increases longevity, decreases risks of acute and chronic diseases, and helps maintain independence and prevent disability (Singh, 2002). There is an abundance of epidemiological studies that reveal unequivocally that physical activity is associated with decreased risk of morbidity and mortality (Paterson, Jones, & Rice, 2007). Being involved and participating in physical activities such as walking, jogging, exercising, and playing sports have also been positively correlated with alleviated bereavement symptoms and maintained or improved functional capacity and independence and, therefore, with overall well-being (Paterson et al., 2007). Thus, physical activities seem to have a positive effect on adjustment to widowhood.

Literature about life satisfaction of widowed older adults seems to be contradictory to some extent when it comes to levels of life satisfaction after spousal

loss, with gaps about the effects of some protective factors, such as age and gender. Another shortcoming of much of the literature is that it deals with the levels of life satisfaction of widowed adults utilizing life satisfaction prior to widowhood as one of the predictor variables. Although there is undoubtedly a strong correlation between a person's level of life satisfaction before and after the loss of a spouse (Lucas et al., 2003; van Baarsen & van Groenou, 2001), this significant relationship may mask the impact of other factors on the level of postwidowhood life satisfaction. As a result, a life satisfaction change variable measuring the difference in the level of life satisfaction after and before spousal loss was created to highlight the contributions of other relevant factors that affect the life satisfaction of widowed older adults. In a similar manner, prior and later physical leisure participation was considered important because individuals' level of leisure involvement after becoming widowed may be influenced by their involvement in leisure pursuits prior to such loss. Therefore, to be a meaningful predictor variable of overall life satisfaction change, the change in the level of physical leisure participation variable was created to accomplish the primary goal of this study, which was to explore the relationship between physical leisure participation change (postloss vs. preloss) and changes in levels of life satisfaction (postloss vs. preloss). For example, if there is a change in leisure participation, which literature indicates otherwise, will that change influence life satisfaction change. By accomplishing such a goal, our study fills a gap in the literature and adds to the existing body of research. It is important to mention that the data set used for this study used only one question to assess life satisfaction, which presents a great limitation to this research, and it will be further discussed in the Limitations section.

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## THEORETICAL FRAMEWORK

Considering multidimensional and multidirectional aging development and aging process in older years, two aging theories encompass the interplay of myriad factors: (a) continuity theory (Atchley, 1989) and (b) selective optimization and compensation theory (SOC; Baltes & Baltes, 1990). The author of continuity theory posited that people wish to maintain participation in the same activities they had enjoyed during their life course, with continuity serving as the primary adaptive strategy for dealing with changes associated with normal aging (Atchley, 1989). Baltes and Baltes (1990), the authors of SOC theory, stressed the balance between gains and losses in the aging process. They further described aging as a process, rather than as a series of stages. When there are limited or reduced resources, Baltes (1987) contended, older adults need to select goals or activities they wish to pursue and optimize their performance by applying resources to those particular goals, while compensating for any deficiencies that could interfere with achieving their goals. For example, older adults might choose to jog or walk instead of running, or might take the eleva-

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tor instead of taking the stairs. They continue engaging in physical activity, but modify activities to fit their physical needs. Such continuity and adjustment in later life become quite observable and normal. Thus, both continuity theory and SOC theory provided a framework for this research study, with the main focus on relationship between life satisfaction and leisure engagement in older adults while adjusting to spousal loss.

## RESEARCH QUESTIONS

The purpose of the study was to investigate the relationship between leisure participation change and life satisfaction change while considering the influence of gender and age as one loses a spouse. I investigated the following research questions: Is there a relationship between life satisfaction change (postloss vs. preloss) and physical leisure participation change (postloss vs. preloss)? What is the relationship between life satisfaction change (postloss vs. preloss) and age? Is there a relationship between life satisfaction change (postloss vs. preloss) and being female?

## METHOD

This research was an observational, descriptive, and predictive study with a correlation research design utilizing longitudinally collected data on older adults from the Americans' Changing Lives (ACL) data set (ACL, n.d.) collected in 1986, 1989, 1994, 2002, and 2012 and archived for public use with the University Of Michigan's Inter-University Consortium for Political and Social Research. Participants were recruited using a stratified random sample of all cities within the United States. The analytic sample included older adults who participated in the original study and were interviewed again in either Wave III (2002) or Wave V (2012). Participants were included in the sample as long as they were at least age 65, because those who are 65 and older are defined as older adults (Fields & Casper, 2001) and widowed during at least one of the two interviews (e.g., Wave III or Wave V). All those who remarried after widowhood were not selected for this study in order to focus specifically on widowed older adults (as opposed to including remarried older adults). The level of significance was set to  $\alpha = .05$ . In examining statistical power for this study, a power level of  $1 - \beta = .80$  was used to make an initial determination of the number of participants necessary to detect an effect when one exists (Remler & Van Ryzin, 2011). Using G\*Power software it was determined that a sample size of  $N = 175$  participants was needed in order to produce a regression model with a statistical power of  $1 - \beta = .80$  assuming a medium effect size (coefficient of determination  $R^2 = .06$ ). The sample size of 222 exceeded the target sample size of  $N = 175$  needed to produce a statistical power level of .80.

## Variables

Life satisfaction was assessed by self-report through a single item: “How satisfied are you with your life as a whole?” (ACL, n.d.). Participants rated their life satisfaction on a 5-point Likert-type scale ranging from 1 (*completely satisfied*) to 5 (*not at all satisfied*; House, 2013). Due to the structure of the scale, a positive life satisfaction change score indicates participants’ life satisfaction assessment declined since the time of loss, whereas a negative life satisfaction change score indicates that the participant’s life satisfaction assessment improved since the time of loss. To obtain the level of change in life satisfaction, each participant’s life satisfaction assessment prior to loss and after loss had to be extracted from the database.

Physical leisure participation included activities such as walking, gardening, and sports/exercise activities, and participants were asked about the frequency of their involvement in such activities (House, 2013). Each of these items were answered on a 4-point Likert-type scale ranging from 1 (*more than once a week*) to 4 (*never participating*; House, 2013). A composite physical leisure participation score was obtained. The physical leisure participation change score was the difference between the composite physical leisure participation scores after the time of spousal loss and before the time of spousal loss, respectively. Due to the way that the scale was structured, a positive composite physical leisure participation change score indicates that the individual’s physical leisure participation decreased since the time of loss, whereas a negative composite physical leisure participation change score indicates that the person’s physical leisure involvement increased since the time of loss.

Age at time of loss was calculated from the data provided in the ACL database by summing the participant’s age at Wave I (1986) and the number of years between 1986 and the year in which the participant lost their spouse, as reported in the database.

Gender was one of the demographic items reported by participants in the initial data collection (Wave I), with participants reporting their biological sex as a binary categorical variable: male or female (House, 2013). In addition to the aforementioned variables, demographic information factors (i.e., race, socioeconomic status [SES], educational level, employment status) were considered as control variables because they may affect the relationship between the independent and dependent variables (Remler & Van Ryzin, 2011).

## PROCEDURE

With the filtered data file in SPSS, descriptive statistics were calculated and the sample mean, standard deviation, and range for each variable was produced, as shown in Table 1. A correlation matrix (Table 2) was generated to determine which of the control variables and independent variables had significant relationships with the dependent variable, and if any significant correlations

**TABLE 1**  
**Descriptive Information for Widowed Older Adults**

Variable	N	M	SD	Range	
				Minimum	Maximum
Life satisfaction change	222	-0.09	1.14	-3.0	4.0
Physical leisure change	222	-0.38	0.90	-2.3	3.0
Age at time of loss	222	72.03	9.39	47.0	94.0

existed between any pairs of the predictor variables (i.e., control or independent variables). The normality of the dependent variable was checked as well.

Additionally, three hierarchical linear regressions were performed using SPSS to investigate the predictive value the independent variables had on the outcome variable (i.e., change in life satisfaction). Before running a regression model, all the assumptions pertinent to regression were checked and met. After running three hierarchical regression models, G\*Power analyses was performed on a post-hoc basis to determine the realized statistical power levels for each of the models.

## RESULTS

Descriptive statistics showed that the majority of the participants (71%) in this study were White, and over 80% were female. In addition, only 14% of the participants had a college degree, and only 10% were employed. The reported employment status (e.g., 90% of retired) was not surprising given that the sample consisted of adults ages 65 and older. For SES, 13% of subjects were

**TABLE 2**  
**Correlations of Study Variables**

Variable	1	2	3	4	5	6	7	8	9	10
1. LSC	—									
2. PLPC	.21**	—								
3. Female	-.19**	.05	—							
4. Age	.20**	-.38**	-.00	—						
5. White	.04	-.08	.01	.11	—					
6. Education	-.03	-.03	.13*	-.06	.00	—				
7. Employment	-.05	-.03	.03	-.09	-.10	-.30**	—			
8. Low SES	.07	.08	-.02	-.09	-.03	-.11	-.34**	—		
9. Lower to middle SES	-.09	.06	-.06	.08	.06	.06	.07	-.18	—	
10. High SES	-.01	-.01	.11	-.04	-.02	-.01	.10	.93	.14	—

*Note.* N = 222. Measures for life satisfaction change (LSC) and physical leisure participation change (PLPC) are structured such that negative scores indicate a positive change and vice versa. Age = age at the time of loss; SES = socioeconomic status.

\* $p < .05$ . \*\* $p < .01$ .

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in the high SES category, and remaining participants were evenly distributed amongst the remaining SES categories. Table 1 shows means, standard deviations, and ranges for the continuous variables used in this study. The mean life satisfaction change score of 0.09 indicates that on average, widowed older adults experience little life satisfaction change following spousal loss. Similarly, the mean scores for physical leisure participation change were close to zero, indicating that widowed older adults, on average, experience little change in the frequency of physical leisure activity engagement following spousal loss. The majority of the life satisfaction change scores (83.8% of participants) fell between -1 and 1, and the majority of the scores for physical leisure participation changes fell between -2.5 and 2.5 (85.6% of participants). These results further support the notion that most participants exhibited minimal changes in each of these areas following spousal loss.

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The correlation matrix (Table 2) shows that the variable of age at the time of spousal loss and the independent variables of physical leisure participation change and being female had statistically significant correlations with the dependent variable (i.e., life satisfaction change). The age at time of loss had a weak-to-medium statistically significant positive correlation of .20 with the dependent variable, suggesting that being widowed later in life tends to contribute to a more severe deterioration in life satisfaction. The physical leisure participation change also had a weak-to-moderate positive correlation of .21 with the dependent variable, suggesting that a decrease in physical leisure participation following spousal loss correlates with a corresponding decrease in overall life satisfaction. Finally, being female had a weak-to-moderate statistically significant negative correlation of -.19 with life satisfaction change, indicating that female participants tended to experience a lesser degree of deterioration in life satisfaction following spousal loss than did male participants.

## HIERARCHICAL REGRESSION RESULTS

As a baseline, the first step of the hierarchical model was a simple linear regression using the control variable of age at time of loss as the sole predictor variable. As shown in Step 1 of Table 3, this regression was statistically significant as evidenced by its ANOVA *F* statistic  $p < .01$ . The standardized beta for the age at time of loss variable was ( $\beta = .19, p < .01$ ). This positive relationship between the two variables indicate that persons who lost a spouse at later ages tended to experience a greater degree of decline in life satisfaction as compared to those who lost a spouse at younger ages. In this model, the adjusted  $R^2$  change of .03 for Step 1 indicates that 3% of the variability in the dependent variable was explained by the age at time of loss control variable.

After adding the physical leisure participation change variable, as shown in Step 2 of Table 3, the regression as a whole was also statistically significant, as evidenced by the  $p$  value of the ANOVA *F* statistic,  $p < .01$ . In this model,



**TABLE 3**

**Summary of the Hierarchical Regression Analysis for Predicting Life Satisfaction Change in Widowed Older Adults**

Variable	Step 1			Step 2			Step 3		
	<i>B</i>	<i>SE</i>	$\beta$	<i>B</i>	<i>SE</i>	$\beta$	<i>B</i>	<i>SE</i>	$\beta$
Age at time of loss	.02	.01	.20**	.02	.01	.15*	.02	.01	.14*
Physical leisure participation change				.23	.09	.18**	.03	.09	.18**
Female							-.53	.19	-.18**
ANOVA <i>F</i>		8.15**			7.75**			8.04**	
$\Delta F$		8.15**			7.75**			8.13**	
Adjusted <i>R</i> <sup>2</sup>		.03			.06			.09	

Note. *N* = 222. ANOVA = analysis of variance.  
 \**p* < .05. \*\**p* < .01.

the standardized beta for the age at time of loss variable remained statistically significant at ( $\beta = .15, p < .05$ ). The standardized beta for the physical leisure participation change predictor was also statistically significant ( $\beta = .18, p < .01$ ). This suggests that people who experience deterioration in physical leisure participation following the loss of a spouse tend to also experience a decline in overall life satisfaction. Likewise, those who participate to a greater degree in physical activities following spousal loss also tend to experience an improvement in overall life satisfaction. Moreover, the adjusted *R*<sup>2</sup> change of .03 for this step indicates that the inclusion of the change in physical leisure participation predictor variable explained an additional 3% of the variability of the dependent variable.

Finally, gender was included as an additional predictor variable in Step 3 of Table 3. The reported *p* value for the ANOVA *F* statistic being less than .01 indicates that this regression is statistically significant as a whole. The standardized beta for the gender variable was also statistically significant ( $\beta = -.18, p < .01$ ). Because gender was coded as 0 for male and 1 for female, this negative beta reveals that women had smaller life satisfaction change scores than did men. This result indicates that compared with men, women experienced less life satisfaction deterioration following spousal loss. The adjusted *R*<sup>2</sup> change of .03 for Step 3 implies that the gender predictor variable explained an additional 3% of the variability of the life satisfaction change dependent variable.

**DISCUSSION**

The results of this study showed a positive relationship between age at time of loss and life satisfaction change, indicating that people in later life who lost a spouse at later ages tended to experience a greater degree of deterioration in life satisfaction when compared with those who lost a spouse at younger ages.

However, the meaningfulness of this small statistical significance is weak. In other words, a 10-year difference in the age at time of spousal loss (e.g., age 80 vs. age 70) would translate into only a 0.2 point (i.e., 1/5 of a point) decrease in life satisfaction level. Despite the statistical significance, these results may not be practical considering such a small difference in life satisfaction deterioration. It is important to mention that counselors need to be aware of the potential adverse impact that spousal loss can have on adults who lose a spouse at a later age.

The findings of a slight decline in life satisfaction after spousal loss are consistent with previously reviewed literature (Gomez et al., 2013), which indicated that older adults' life satisfaction tends to decrease with age and decrease after spousal loss. On the other hand, these research findings are rather inconsistent with other studies (Lucas et al., 2003; van Baarsen & van Groenou, 2001), indicating that even after some period of adjustment to a major loss, life satisfaction of older adults may improve slightly. Although there was only a small decrease in life satisfaction in older adults over a longer period of time, the finding is still significant and has implications for counselors in terms of helping older adults with positive movement in life satisfaction and preventing potential chronic loss of life satisfaction. Moreover, slight changes in life satisfaction aligns with the SOC theory, which allows for minor changes as older adults tend to select, optimize, and compensate for losses they are experiencing (Baltes, 1987).

The fact that individuals adapt with limited change in frequency of physical leisure participation (Lucas et al., 2003; Nimrod, Janke, & Kleiber, 2009) is consistent with the findings of this research. The mean scores for changes in physical leisure participation were close to zero, indicating that widowed older adults, on average, experience little change in frequency of physical leisure activities following spousal loss. Similarly, the finding of the mean life satisfaction change score of 0.09 indicates that on average, widowed older adults experience little life satisfaction change following spousal loss, which further support results of previous research studies (Gerstorf et al., 2008, Gomez et al., 2013; Mroczek & Spiro, 2005) wherein most participants exhibited minimal changes in life satisfaction and life satisfaction was shown to be rather stable throughout the later adult life, with a slight decline when dealing with losses.

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There was a positive relationship between life satisfaction change and physical leisure participation change, meaning that people who experienced deterioration in physical leisure participation following the loss of a spouse tended to also experience a decline in overall life satisfaction. Likewise, those who participated to a greater degree in physical activities following spousal loss experienced an improvement in overall life satisfaction. Such results are similar to those of other studies supporting the idea that physical engagement has positive effects on well-being and life satisfaction (Holtslander, Bally, & Steeves, 2011; Paterson et al., 2007; Steeves & Kahn, 2005). Older adults involved in jogging, exercising, gardening, or playing sports are more likely to experience

a slight improvement in life satisfaction, which implies that physical leisure activities can provide opportunities for experiencing positive emotions resulting in slightly higher levels of life satisfaction, especially during challenging times. Furthermore, older adults who participated in physical activities prior to loss tend to continue to participate in such activities postloss as well, as indicated by a miniscule variation in the physical participation change variable. Those who do not participate in physical activities prior to loss tend not to participate in such activities after loss. This is consistent with continuity theory (Atchley, 1989). Atchley (1989) posited that certain patterns and routines established in early life are difficult to change, despite stressful and difficult times.

There was a weak negative relationship between life satisfaction change and gender, indicating that women experience less deterioration in life satisfaction following spousal loss than do men. Consistent with reviewed literature earlier, gender is one of the predictors of quality of widowhood; in other words, widowers tend to experience lower levels of life satisfaction than do widows (Stroebe, Hansson, Stroebe, & Schut, 2001). These lower levels of life satisfaction may be due to widowers experiencing greater challenges in coping with spousal loss compared with challenges experienced by widows (Bennett, Smith, & Hughes, 2005). Being female often means being younger, more socially connected, and more resourceful than her partner (Aldwin & Gilmer, 2013; Caserta, 2002). These factors often serve as protectors when dealing with adverse life events (e.g., spousal loss).

Results of this study align with those of previous researchers regarding the positive relationship between physical leisure participation and life satisfaction. Similarly, these results confirmed previous results wherein gender is related to levels of life satisfaction after spousal loss, with women reporting slightly higher levels when compared with men.

### **Implications for Practice**

Despite the fact that the results are statistically significant, small changes observed in levels of life satisfaction might not be meaningful and therefore not practical. Still, this study informs counselors, counselor educators, and professionals working with older populations about some potential factors influencing life satisfaction change of widowed older adults. When working with male clients, it is important for counselors to be aware that the male participants in this study showed slightly higher levels of deterioration in life satisfaction after spousal loss. It is imperative to educate all professionals about the effects of widowhood on life satisfaction, which may allow for proactive work to minimize the potentially negative impact of spousal loss for both genders, but especially for men. Furthermore, counseling interventions might include educating middle and older adults about the importance of understanding changes in later life (e.g., losing a spouse at later age) and challenges associated with them. In addition, the importance of participating in physical activities needs to be communicated

clearly to adults, especially older adults. Providing valuable resources to older adults (e.g., counseling, support groups) can be a tool utilized by professionals to help older adults cope with adversities in later life. Next, expanding social support and networking might serve as valuable component of work with older adults. Men may need a more supportive, empowering, and resources-oriented approach, embedded in a strong therapeutic alliance and with the potential to boost compliance with ongoing engagement. It is imperative for counselors to normalize such adverse experiences as spousal loss for men since men tend to experience greater deterioration in life satisfaction after such losses, ensuring prevention of isolation and acquiring independence. Lastly, counselor educators can play a crucial role in working with future counselors, ensuring that students are educated about the complexity of, and variation in older adult development.

### **Limitations**

Although every effort was made to develop a rigorous research design, there are certain limitations that are important to note. First, despite the fact that life satisfaction refers to a “global assessment of a person’s quality of life according to his or her chosen criteria” (Shin & Johnson, 1978, p. 478), participants were asked only one question to assess this construct. To some extent, this measure might be limiting, and may not accurately capture the complexity of such a construct. Furthermore, this study focused on married couples who lost a spouse. It would be beneficial to include not only married couples, but also those who live in committed relationships and partnerships. Finally, looking at the demographics and proportional representation of race and gender, one can see that the majority of participants were White (71%) and female (81%). Even though this racial and gender representation closely resembles the demographics of older adults living today (Administration on Aging, 2010), it is important to note the lack of generalizability of results to people from other demographic groups.

### **Suggestions for Future Research**

Based on previous research findings (e.g., Nimrod et al., 2009) that indicated possible relationships between physical health and social support with life satisfaction, incorporating those factors in future studies is recommended to provide a greater explanation of variance in life satisfaction. To expand on this topic, comparing the life satisfaction changes of older adult widows, middle adult widows, and young adult widows or including nonwidowed older adults might be beneficial to determine if the current research findings hold true regarding the effect of age at time of loss on changes in life satisfaction. Such comparisons would allow researchers to explore potential differences in degree of overall life satisfaction change in younger versus older widows. Also, it might be helpful to conduct a similar study but focused on widowed and nonwidowed older adults from racial minority groups to determine if there are gender

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differences between minority groups. Finally, future researchers might benefit from incorporating a qualitative approach to delve more deeply into some of the inconsistencies between reviewed literature and the results of this study.

## CONCLUSION

This study examined the relationship between life satisfaction change and physical leisure participation change in widowed older adults while considering the influences of age and gender. Results indicate that there is a statistically significant positive relationship between life satisfaction change and physical leisure participation change. Furthermore, being female is correlated with lower levels of deterioration in life satisfaction. Based on the findings of this study, it might be beneficial to consider not only the positive effects of leisure participation on adjustment to widowhood, but also gender and age as potential predictors of life satisfaction after spousal loss.

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[AU2: I'm unsure of the intended meaning of the underlined sentence. Correct to revise to the following? "For example, if there is a change in leisure participation, will that change influence a change in life satisfaction?"]

[AU3: Are the underlined sections correct as edited?]

[AU4: The mean life satisfaction change in Table 1 is  $-0.09$ . Please reconcile with  $0.09$  where underlined.]

[AU5: Is the Table 2 note correct as edited?]

[AU6: The mean life satisfaction change in Table 1 is  $-0.09$ . Please reconcile with  $0.09$  where underlined.]

[AU7: Is the underlined sentence OK as edited?]

AU8: Americans' Changing Lives (n.d.) seems to be referencing the same data set as House (2013). OK to delete Americans' Changing Lives (n.d.) and replace all in text citations with House (2013)? If not, please note that the provided URL redirects to the ACL homepage, which contains no information about how or where to access the data set being referenced in your article, so I will need an updated URL.]