Original Article

Narrative Group Therapy to Improve Aging Perceptions and Reduce Thanatophobia (Death Anxiety) in Older Adults

Zhale Nozari 1, AbdolAllah Mo'tamedi *1, Hosein Eskandari 1, Zahra Ahmadivand 2

1. Department of General and Clinical Psychology, Faculty of Psychology and Educational Sciences, Allameh Tabataba’i University, Tehran, Iran
2. Department of Psychology, Faculty of Literature and Humanities, Payame Noor University, Mahabad, Iran

* Corresponding Author: Department of General and Clinical Psychology, Faculty of Psychology and Educational Sciences, Allameh Tabataba’i University, Tehran, Iran. Tel: +989199912385, Email address: a_moatamedy@yahoo.com

ABSTRACT

Introduction: Narrative therapy is a psychological intervention focusing on remembering and reconstruction of the people's life events in ways that are of benefit to them, and reduce the impact of challenges in their lives. This study was performed to examine the effect of narrative group therapy (NGT) on aging perceptions and death anxiety among older adults.

Methods: Forty-seven subjects, elderly nursing home residents (Tehran, Iran) with the mean age of 69.2 ± 2.55 were selected and assigned to intervention (n = 24), and control groups (n = 23). The intervention group received eight 90 min weekly sessions of NGT, and data were collected at the baseline, post-test and one month follow-up.

Results: Compared to the control and baseline, NGT intervention was positively influenced the aging perceptions of participants, especially their emotional representations, as well as their beliefs about aging consequences and control over experiences relating to aging. NGT was also found to be effective in the reduction of death anxiety, which were also sustained over the time with significant interaction effect between group and test times (p < 0.05).

Conclusion: To our knowledge, this is the first study investigating the psychological interventions for aging perceptions, as well as NGT for death anxiety in older adults. The intervention was effective to improve the aging perceptions and reduce death anxiety and could be recommended for elderly nursing home residents.

Keywords: Narrative Group Therapy, Aging Perceptions, Death Anxiety, Older Adults

Introduction

Aging is an inevitable biological process accompanied by physical and mental health decline (1). As people age, they may feel less confident about their abilities and control of their lives. Older adults thus may face several distinctive psychological challenges due to aging that have been found to be mainly associated with their perception toward the process (2).

Aging perceptions refer to attitudes towards aging include the awareness of the process and its consequences, feelings of control, and emotional responses to getting older that are shaped by personal experiences and societal attitudes throughout the life-course, and can influence health, functionality and longevity of older adults via physiological, psychological, and behavioral pathways (2-4).

Studies focusing on psychological pathways have demonstrated the association of aging perceptions with cognitive function (5), depressive symptoms and feelings of anxiety, particularly death anxiety (6-8). Nonetheless no research has examined psychological interventions to improve aging perceptions; while may have multi-outcome benefits such as less death anxiety (7, 9).
Death anxiety or thanatophobia describes the fear of death or dying process that may be a consequence of unresolved psychological and physical distress, and lead to health decline (10). Researchers have treated the death anxiety by several psychotherapeutic approaches, including existential therapy (11), cognitive behavior therapy (12), brief individual psychotherapy (13), and humor therapy (14), in both non-clinical samples and illnesses groups. Also, a case study has reported the effectiveness of narrative therapy to reduce death anxiety in a 73-years old man residing in a nursing home (15). This particular type of psychological intervention (Narrative therapy) focuses on remembering and reconstruction of the people's life events in ways that are of benefit to them, and reduce the impact of challenges in their lives (16). Narrative therapy leads to normal identity and improves positive self-concept about the situation and period of time people are living that can improve psychological well-being and mental health (6, 16).

The effectiveness of narrative therapy has also reported for various problems (17), and disorders, particularly depression and anxiety among non-illnesses (18) or illnesses groups such as cancer (19) or HIV/AIDS (20). Moreover, the intervention has been proven useful for older adults with substance abuse disorders (21), memory loss (22), and depression (23). Although the most of these studies have evaluated the intervention for individuals, the narrative group therapy (NGT) has proven as both helpful and enjoyable for older adults (21, 24).

Considering the function mechanism of narrative therapy and benefits of group interventions such as learning from each other’s, reconstructing problem-saturated narrates, especially those related to the aging perceptions seems to improve the sense of life satisfaction and successful aging in older adults, and they may become more comfortable with the aging process and reduce the fear of dying as well.

Since nursing home residents may face more psychological problems due to the loss of home, spouse, and friends, they require more mental health care (25). This study thus was performed to investigate the effectiveness of NGT on improving aging perceptions and reducing death anxiety in elderly nursing home residents.

Methods

Study design

The present study is a quasi-intervention research with a primary endpoint set on the effect of NGT on aging perceptions and death anxiety in older adults through the baseline, post-test, and follow-up design. Outcomes for both experimental and control groups were assessed using Aging Perceptions Questionnaire (APQ) and Death Anxiety Questionnaire (DAS) at one week before the intervention (baseline), immediately and one month after the intervention ended (Post-test and follow-up, respectively).

Participants

The flow of participants is shown in Fig.1. The participants were selected from the elderly men and women referred to the nursing homes in Tehran, Iran. The inclusion criteria were age ≥ 65, willing to participate, as well as the ability to communicate and complete the questionnaires. Residents with Alzheimer or any diseases that could interfere with intervention were excluded. According to these criteria, 32 of 98 initially selected older adults, including 15 men and 17 women were excluded. Moreover, nineteen residents (12 men and 7 women) refuse to participate. The final participants comprised 47 older adults were assigned in control (n = 23) and experimental (n = 24) groups. Moreover, two participants discontinued the intervention due to lack of motivation (n = 1), and health problems (n = 1). At the follow-up, because of health problems, two participants were also excluded.

Ethical consideration

Ethical guidelines for use human in the research were followed (26), and approved by the Allameh Tabataba’i University (Tehran, Iran) Ethics Committee (No: 2396511). All participants provided informed consent.

Measures

Aging perceptions

The self-perceptions of aging of the participants were evaluated by the APQ comprising 32 items, which represent seven aging perception subscales, including chronic-timeline (awareness of one’s age), cyclical-timeline (experiences of variations in the awareness of aging), negative and positive consequence (negative and positive beliefs about the impact of aging on one’s life, respectively), emotional representations (emotional responses generated by aging), positive and negative control (positive and negative beliefs about personal ways of managing experience of aging, respectively), (3). Participants rate their agreement with a series of statements (e.g., Emotional representations: “I get depressed when I think about getting older”) with a five-point response scale, ranging from 1 (strongly disagree) to 5 (strongly agree). However, the negative control scale is reverse coded; we presented all items based on the same scale. Barker et al. (3), reported a good internal consistency for the subscales with the exception of the consequences positive subscale (α = 0.64), the Cronbach alpha coefficients for subscales were above 0.7 and typically exceeded 0.8. The original APQ items have translated into Persian for Iranian population with the Cronbach alpha coefficient, ranging 0.64 to 0.81 for subscales (27, 28).
**Death anxiety**

The other questionnaire that the participants responded to was the Templer DAS (29), which consists of 15 items self-report scale to measure death anxiety by investigating the respondent's attitudes toward death with ranged scores between 0 and 15. Participants show their agreement to the statements with Yes (1) or No (0). Templer (29) reported a test-retest reliability of this scale 0.83, and its internal consistency 0.76, which has also confirmed by Tomas and Gomez (30). Beside of its validity and reliability for the Iranian population (31), this scale was chosen because of its ease of application for older adults.

**Intervention**

The participants in the intervention group were divided into three teams with 8 participants (32), and received eight weekly sessions of 90 min NGT by two proficient psychologists, according to Poole et al. (24), which is based on and/or adopted from the work of Michael White (16,33). The followed narrative therapy manual contains five broad phases, including developing a therapeutic relationship (session 1), eliciting problem stories (sessions 2 and 3), deconstructing dominant stories (sessions 4), embracing preferred stories (sessions 5 and 6), and living enriched stories (sessions 7 and 8), which well described in the literature and original report (16, 24, 33).

**Data analysis**

The data were analyzed statistically using the SPSS 23 software (Chicago, IL, USA) and provided as mean with standard deviation (SD). The Chi square and t-tests were used to evaluate baseline differences and homogeneity of characteristics between the experimental and control groups. The repeated measures (Mixed model) of ANOVA with group and test time as between-subject and within-subject factors, respectively, and post hoc test was used to evaluate the effects of the NGT on aging perceptions and death anxiety. The normality and homogeneity of variance of data were confirmed by the Shapiro-Wilk and Levin tests, respectively. The sphericity of the data was determined using Mauchly’s test. The partial Eta squared ($\eta^2$) effect size was also calculated as part of the ANOVA analysis, where $\eta^2 \geq 0.01$ indicates a small, $\geq 0.06$ medium, and $\geq 0.14$ a large effect size (34). A significance level of $p < 0.05$ was used for all analysis.

![Flow chart of the study showing participants flow through each stage and data analysis.](image-url)
Results

Participant characteristics

Demographic profiles of participants are presented in Table 1. Forty-seven older adults have participated in the study that 27 (57.4%) of whom were women. The average age of participants was 69.2 ± 2.55, range 65-76 years. Four (8.5%) participants were single, 9 (19.1%) married, and 34 (72.4%) widows/divorced. Moreover, 25 (53.2%) participants had primary/guidance education levels, 17 (36.2%) high school diploma, and 5 (10.6%) academic education. Of the 47 participants, 24 were in the experimental (NT) group and 23 in the control group. Statistical analysis of age, gender, marital and education status of participants revealed that the two groups were homogenous (Table 1). Moreover, there were no significant differences in aging perceptions and death anxiety variables between experimental and control groups at the baseline (p > 0.05), and the groups were homogeneous (Table 2).

Aging perceptions

Table 3 shows descriptive statistics and ANOVA results for the aging perceptions variables. Compared to the control condition, participants in the intervention group revealed significantly increased mean scores for the positive control (p = 0.034, $\eta^2 = 0.094$), negative control (p = 0.043, $\eta^2 = 0.088$), as well as positive consequences (p = 0.030, $\eta^2 = 0.1$). While, the negative consequences (p = 0.047, $\eta^2 = 0.085$) and emotional representations (p = 0.01, $\eta^2 = 0.121$), were significantly increased in the intervention group compared to the control. The effects of the intervention on the influenced variables were also significant over the test times (positive control: p = 0.019, $\eta^2 = 0.092$; negative control: p = 0.014, $\eta^2 = 0.093$; positive consequences: p = 0.005, $\eta^2 = 0.109$; negative consequences: p = 0.003, $\eta^2 = 0.123$, and emotional representations: p = 0.01, $\eta^2 = 0.109$). Results also revealed a significant interaction effect between time and group for positive control: p = 0.047, $\eta^2 = 0.071$; negative control: p = 0.020, $\eta^2 = 0.114$; positive consequences: p = 0.002, $\eta^2 = 0.133$, and negative consequences: p = 0.001, $\eta^2 = 0.192$), indicating signficant change of the variables in the experimental but not control group, as well as at post-test and follow up compared to the baseline. However, interaction of group and test time for emotional representations was not significant (p = 0.14, $\eta^2 = 0.044$). Moreover, no significant differences were found for chronic and cyclical timeline between groups, over the time, and time and group interaction (P > 0.05).

Death anxiety

The results of the ANOVA analysis of death anxiety mean scores are shown in table 3. Compared to the control, participants in the intervention group showed a significant decrease in death anxiety mean scores (P = 0.001, $\eta^2 = 0.28$), which were also maintained over the time (p = 0.000, $\eta^2 = 0.35$). Moreover, the interaction of group and time was significant (p = 0.001, $\eta^2 = 0.27$). These results indicate that at both test times (post-test and one month follow-up) death anxiety of participants were significantly reduced in the intervention group while did not change in the control group over time.
Table 2. Homogeneity testing of variables at the baseline

<table>
<thead>
<tr>
<th>Variables</th>
<th>NGT (n = 24) M (SD)</th>
<th>Control (n = 23) M (SD)</th>
<th>t</th>
<th>p-value</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Aging Perceptions</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Timeline-Chronic</td>
<td>2.88 (0.97)</td>
<td>2.73 (1.04)</td>
<td>0.53</td>
<td>0.59</td>
</tr>
<tr>
<td>Timeline-Cyclical</td>
<td>2.64 (1.14)</td>
<td>2.47 (0.96)</td>
<td>0.55</td>
<td>0.56</td>
</tr>
<tr>
<td>Emotional Representations</td>
<td>3.23 (1.10)</td>
<td>3.38 (1.08)</td>
<td>-0.48</td>
<td>0.63</td>
</tr>
<tr>
<td>Positive Control</td>
<td>3.00 (0.86)</td>
<td>2.93 (0.94)</td>
<td>-0.28</td>
<td>0.78</td>
</tr>
<tr>
<td>Negative Control</td>
<td>2.74 (1.15)</td>
<td>2.81 (1.27)</td>
<td>-0.20</td>
<td>0.84</td>
</tr>
<tr>
<td>Positive Consequences</td>
<td>3.00 (1.04)</td>
<td>2.90 (1.19)</td>
<td>0.29</td>
<td>0.77</td>
</tr>
<tr>
<td>Negative Consequences</td>
<td>3.33 (1.03)</td>
<td>2.96 (1.11)</td>
<td>1.17</td>
<td>0.25</td>
</tr>
<tr>
<td><strong>Death Anxiety</strong></td>
<td>8.33 (1.16)</td>
<td>7.86 (1.39)</td>
<td>1.24</td>
<td>0.22</td>
</tr>
</tbody>
</table>

NGT: Narrative Group Therapy; T × G: Time × Group interaction. * p < 0.05; ** p < 0.01

Table 3. ANOVA results for effects of the NGT on the aging perceptions variables and death

<table>
<thead>
<tr>
<th>Variables</th>
<th>Baseline</th>
<th>Post-test</th>
<th>Follow-up</th>
<th>Sources</th>
<th>F (p)</th>
<th>ηp²</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Timeline-Chronic</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NGT</td>
<td>2.88 (0.97)</td>
<td>2.97 (0.71)</td>
<td>2.78 (0.82)</td>
<td>Group</td>
<td>1.09 (0.30)</td>
<td>0.024</td>
</tr>
<tr>
<td>Control</td>
<td>2.73 (1.04)</td>
<td>2.68 (0.97)</td>
<td>2.60 (0.98)</td>
<td>Time</td>
<td>0.43 (0.65)</td>
<td>0.009</td>
</tr>
<tr>
<td><strong>Timeline-Cyclical</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NGT</td>
<td>2.64 (1.14)</td>
<td>2.83 (1.03)</td>
<td>2.70 (0.91)</td>
<td>Group</td>
<td>1.27 (0.26)</td>
<td>0.028</td>
</tr>
<tr>
<td>Control</td>
<td>2.47 (0.96)</td>
<td>2.55 (0.69)</td>
<td>2.36 (0.85)</td>
<td>Time</td>
<td>0.90 (0.41)</td>
<td>0.020</td>
</tr>
<tr>
<td><strong>Emotional Representations</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NGT</td>
<td>3.23 (1.10)</td>
<td>2.37 (0.68)</td>
<td>2.61 (1.01)</td>
<td>Time</td>
<td>5.49 (0.01)*</td>
<td>0.109</td>
</tr>
<tr>
<td>Control</td>
<td>3.38 (1.08)</td>
<td>3.23 (0.91)</td>
<td>3.16 (0.92)</td>
<td>T × G</td>
<td>2.07 (0.14)</td>
<td>0.044</td>
</tr>
<tr>
<td><strong>Positive Control</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NGT</td>
<td>3.00 (0.86)</td>
<td>3.76 (0.72)</td>
<td>3.46 (1.05)</td>
<td>Group</td>
<td>4.95 (0.034)*</td>
<td>0.094</td>
</tr>
<tr>
<td>Control</td>
<td>2.93 (0.94)</td>
<td>3.01 (0.85)</td>
<td>2.79 (0.89)</td>
<td>Time</td>
<td>4.57 (0.019)*</td>
<td>0.092</td>
</tr>
<tr>
<td><strong>Negative Control</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NGT</td>
<td>2.74 (1.15)</td>
<td>3.69 (0.94)</td>
<td>3.34 (0.88)</td>
<td>Group</td>
<td>4.33 (0.043)*</td>
<td>0.088</td>
</tr>
<tr>
<td>Control</td>
<td>2.81 (1.27)</td>
<td>2.78 (0.81)</td>
<td>2.67 (0.97)</td>
<td>Time</td>
<td>4.59 (0.014)*</td>
<td>0.093</td>
</tr>
<tr>
<td><strong>Positive Consequences</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NGT</td>
<td>3.00 (1.04)</td>
<td>3.85 (0.94)</td>
<td>3.39 (1.13)</td>
<td>Time</td>
<td>5.52 (0.005)**</td>
<td>0.109</td>
</tr>
<tr>
<td>Control</td>
<td>2.90 (1.19)</td>
<td>2.83 (0.65)</td>
<td>2.64 (1.04)</td>
<td>T × G</td>
<td>6.89 (0.002)**</td>
<td>0.133</td>
</tr>
<tr>
<td><strong>Negative Consequences</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NGT</td>
<td>3.33 (1.03)</td>
<td>2.17 (0.81)</td>
<td>2.35 (0.96)</td>
<td>Group</td>
<td>6.37 (0.003)**</td>
<td>0.124</td>
</tr>
<tr>
<td>Control</td>
<td>2.96 (1.11)</td>
<td>3.08 (0.74)</td>
<td>3.14 (0.82)</td>
<td>Time</td>
<td>10.68 (0.00)**</td>
<td>0.192</td>
</tr>
<tr>
<td><strong>Death Anxiety</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NGT</td>
<td>8.33 (1.16)</td>
<td>5.16 (0.36)</td>
<td>5.62 (1.7)</td>
<td>Group</td>
<td>17.45 (0.00)**</td>
<td>0.28</td>
</tr>
<tr>
<td>Control</td>
<td>7.86 (1.39)</td>
<td>7.12 (0.84)</td>
<td>7.47 (1.54)</td>
<td>Time</td>
<td>24.13 (0.00)**</td>
<td>0.35</td>
</tr>
</tbody>
</table>

NGT: Narrative Group Therapy; T × G: Time × Group interaction. * p < 0.05; ** p < 0.01

Discussion

Narrative therapy is a therapeutic intervention with positive effects on the psychological and subjective well-being of older adults that can reduce the impact of challenges in their lives through reconstructing their life stories (33; 16).

The effectiveness of narrative therapy is well established for the treatment of several problems and disorders in a variety of populations. Recent studies have also suggested the therapeutic potential of the intervention for various groups of older adults, particularly through the group practices (21-24). Consistently, the results of this study revealed the effectiveness of NGT to improve the aging perceptions and reduce death anxiety of elderly nursing home residents.

The timeline, consequences, control and emotional representation have identified as critically important aging perceptions affecting the health and functioning in older adults (2, 3, 8, 35).

Discussion revealing the effectiveness of NGT to improve the aging perceptions and reduce death anxiety of elderly nursing home residents.

The timeline, consequences, control and emotional representation have identified as critically important aging perceptions affecting the health and functioning in older adults (2, 3, 8, 35).

Discussion revealing the effectiveness of NGT to improve the aging perceptions and reduce death anxiety of elderly nursing home residents.

The timeline, consequences, control and emotional representation have identified as critically important aging perceptions affecting the health and functioning in older adults (2, 3, 8, 35).

Discussion revealing the effectiveness of NGT to improve the aging perceptions and reduce death anxiety of elderly nursing home residents.

The timeline, consequences, control and emotional representation have identified as critically important aging perceptions affecting the health and functioning in older adults (2, 3, 8, 35).

Discussion revealing the effectiveness of NGT to improve the aging perceptions and reduce death anxiety of elderly nursing home residents.
mainly associated with inactivity and poor health (3). Robertson and Kenny (5) have found that older adults with higher awareness of aging are more likely to decrease engagement with family and friends. However, the timeline is the only aging perceptions subscale that was not affected by NGT, which may be due to the less efficacy of the intervention on awareness of the aging process, and seems interventions that can improve the activity of older adults may be more effective for the timeline.

Sexton et al. (36) have shown that negative emotional responses to aging (emotional representations) is associated with physical limitations, and more strongly with higher levels of depression and anxiety. In this study, the NGT significantly decreased the emotional representations, suggesting the therapeutic potential of the intervention for the issue, which may be explained by the new preferred identity of participants that could improve their psychological health and decrease their negative emotions (6, 16).

NGT has been found to positively influence the self-concept and the ability of older adults to cope with the different challenges in their life (21-23), which this may explain the positive effects of NGT on the control of participants over their positive and negative experiences.

Significant relations have been seen between the beliefs about control over experiences relating to aging and the impact of aging on life, which both can influence the subjective well-being (3). In this study, beliefs of the older adults about the aging consequences were also shifted by the intervention, as the negative beliefs of participants were significantly decreased, while their positive beliefs about the aging consequences were significantly improved. One possible explanation for this may be the positive effects of NGT on the self-concept of participants through making their new preferred identity, which plays an important role in the well-being and life satisfaction of older adults (6, 16).

Considering the important role of aging perceptions in the physical and mental health, the NGT thus may have multi-outcome benefits such as reducing the burden of anxiety and depression among the older adults (7, 9).

Death anxiety is a common phenomenon among older adults strongly associated with the aging perceptions, which at high levels may lead to maladaptation and depression (8, 37-39). Nonetheless, there are few clinical and individual psychotherapeutic studies on death anxiety (12, 14, 15). Our results revealed a significant reduction in death anxiety of older adults received NGT that was maintained at least for one month after the intervention and more effective than the previously evaluated therapies, and appropriate for larger groups of clients. Given that the identity and aging perceptions are both linked with the death anxiety (7, 40), the less anxiety of participants after narrative therapy may be explained by the positive effects of the alternative stories to making their new preferred identity, and improving their meaning of life. However, whether narrative therapy directly or through aging perceptions has affected the death anxiety of the participants is unclear and needs to be clarified.

Conclusion

The results of this study revealed the effectiveness of NGT to reduce death anxiety of elderly nursing home residents, as well as improving their perceptions about aging process (Consequences and controls, and emotional representations), which its effects could be sustained for at least one month after the intervention. However, further studies should have focused on the long-term effects of the intervention with a larger sample size as a randomized control trial. To our knowledge, this is the first study investigating the psychological interventions for aging perceptions, as well as NGT for death anxiety in older adults, which could be recommended for nursing homes.

Study limitations

This study has some limitations such as self-report questionnaires, as well as small sample size for the intervention group, which may have influenced the execution of the intervention.

Conflict of interests

The authors declare no conflict of interests.

Acknowledgments

The authors would like to thank participants for taking part in this research. This study was supported by the Research Council of the Allameh Tabataba’i University (Tehran, Iran).

Authors’ contributions

All authors contributed to the design of study, implementation and analysis of data. Also, they contributed to draft, and approved the final version of the article.

References

Narrative Group Therapy in Aging


