Psychosocial Intervention on the Dual-Process Model for a Group of COVID-19 Bereaved Individuals in Wuhan: A Pilot Study

Zhihong Yu[1], Jinjun Liang[2], Liping Guo[3], Lirui Jiang[4],
Jian-ying Wang[5], Moli Ke[5], Liao Shen[6], Ningning Zhou[6] [iD], and
Xinxian Liu[7] [iD]

Abstract

Wuhan was the first large city where the initial breakout of COVID-19 took numerous lives. A group of social workers and mental health specialists coordinated the "Be Together Program" (BTP), a psychosocial grief intervention program to help a group of Wuhan COVID-19 bereaved people. Under the Dual-process model framework, BTP used the internet and social media as the main tools, combined with group and

[1]School of Sociology, Wuhan University, Wuhan, China
[2]Department of Cardiology, Renmin Hospital of Wuhan University, Wuhan, China
[3]Zhongshan Huineng Social Work Service Centre, Guangzhou, China
[4]Hezhou University, Hezhou, China
[5]Department of Breast and Thyroid Surgery, Renmin Hospital of Wuhan University, Wuhan, China
[6]School of Psychology and Cognitive Science, East China Normal University, Shanghai, China
[7]Grief Healing Service, Independent Researcher, Westfield, NJ, USA

Corresponding Authors:
Xingxian Liu, Grief Healing Service, Independent Researcher, 5 Sunnywood Drive, Westfield, NJ 07090, USA.
Email: benliu213@gmail.com

Zhihong Yu, School of Sociology, Wuhan University, Luojiashan, Wuhan, Hubei Province 430072, China.
Email: zhyu@whu.edu.cn

Ningning Zhou, Shanghai Key Laboratory of Mental Health and Psychological Crisis Intervention, Affiliated Mental Health Center (ECNU), School of Psychology and Cognitive Science, East China Normal University, No. 3663 Zhongshanbei Road, Putuo District, Shanghai 200062, China.
Email: nnzhou@psy.ecnu.edu.cn

individual intervention. Additionally, it employed a "Supermarket Mode" with abundant intervention themes and approaches for BTP participants to choose according to their special needs. Additionally, Chinese cultural elements are integrated into the program. At the end of the program, the grief scores of participants in the qualified sample reduced significantly, and the prevalence of the potential Prolonged Grief Disorder diagnosis reduced from 75% to 12%. The study also found that the BTP was especially effective for those who had high levels of grief reaction.

Introduction

The COVID-19 pandemic has become a global public health crisis and is now one of the leading causes of death worldwide in this century. As of November 9, 2021, worldwide, there have been more than 250 million confirmed cases of COVID-19, and more than five million deaths (World Health Organization, 2021a). Each COVID-19 death, on average, could affect nine close relatives (Verdery et al., 2020). Therefore, more than 45 million people may have experienced bereavement because of COVID-19.

The death of a loved one is one of the most devastating experiences an individual can have in his/her lifetime (Bonanno & Kaltman, 1999). Most bereaved individuals present a series of grief reactions such as yearning, preoccupation with the loss, sorrow, blame, anger, or social withdrawal (Lundorff et al., 2017). For most people, these reactions subside weeks or months following the loss. However, for a significant number of minority bereaved individuals, these grief reactions become chronic and persistent and even impair their regular work or life functions (Shear, 2015). This persisting and complicated grief, named Prolonged Grief Disorder (PGD), was recently added to the International Classification of Diseases (ICD-11) (World Health Organization, 2021b). The American Psychiatric Association also approved the inclusion of PGD in the revised version of the Diagnostic and Statistical Manual of Mental Disorders in 2020 (American Psychiatric Associates, 2020).

Compared with naturally occurring death events, death caused by COVID-19 is more traumatic. Some factors may make the loss extremely difficult. For example, COVID-19 deaths usually are sudden and unexpected (Sterpetti, 2020). For some people, the death process is extremely painful (Abayomi et al., 2020). Communication between medical staff and patients and between family and patients seems impossible due to the heavy protective clothing and the strict pandemic prevention and controlling requirements (Stroebe & Schut, 2021). Many COVID-19 patients died lonely in the hospital. Additionally, the bereaved family or friends were not allowed to hold

conventional funeral rites, which may have worsened their grief reactions as they had no chance to say goodbye to their loved ones (Gonçalves Júnior et al., 2020). Moreover, because of the quarantine requirements, social support for bereaved people is usually very limited at such a fragile time, and their sense of isolation will increase (Eisma et al., 2020). Compared to people who experience a natural death of a loved one, COVID-19 bereaved people may present more severe traumatic grief symptoms, including guilt, self-blame, somatization, regret, anger, and other symptoms not included in ICD-11 PGD diagnostic guidelines (Kokou-Kpolou et al., 2020). Overall, these factors may worsen the grief symptoms for COVID-19 bereaved people (Eisma et al., 2020). In general, with naturally occurring deaths, the prevalence of PGD for bereaved individuals is about 10% (Lundorff et al., 2017), but for COVID-19 bereaved people, it may reach as high as 30% (Bui et al., 2021).

In the past few decades, different grief interventions have been developed to reduce the adverse consequences and to promote positive adaptation after losing a loved one. It should be noted that the prevention and treatment of PGD are still limited, and that most of the grief intervention methods were developed in the Western developed countries with very limited studies conducted in the East and/or developing countries and regions (Johannsen et al., 2019). Considering the unique background of the COVID-19 pandemic, more intervention methods are needed for COVID-19 bereaved people. Although some literature proposed guidelines on preventing and treating COVID-19 bereavement (Carr et al., 2020; Pfefferbaum & North, 2020; Walsh, 2020), there has been no literature presenting evidence-based grief intervention for COVID-19 bereaved people.

In this pilot study, we will review and analyze the results of the "Be Together Program" (BTP), which aimed to explore a new psychosocial grief intervention approach developed for Wuhan COVID-19 bereaved people.

The Dual-Process Model Framework

Stroebe and Schut proposed the Dual Process Model (DPM) of coping with bereavement (Stroebe & Schut, 1999, 2001, 2010, 2021). This model consists of three concepts: loss-oriented coping (LO), restoration-oriented coping (RO), and oscillation. Loss-oriented coping concentrates on and deals with loss-related experiences. It involves being preoccupied with the deceased person and negative feelings such as yearning, longing, and anger. Restoration-oriented coping deals with the secondary stress caused by the loss (e.g., reduced income and increased responsibility). It includes doing new things, distracting oneself from grief, and establishing new roles, identities, and relationships. Oscillation refers to the "alternation between loss and RO, the process of the juxtaposition of confrontation and avoidance of different stressors associated with bereavement" (Stroebe & Schut, 1999, p. 215). The oscillation process between loss-oriented and RO helps people better adapt to the loss by periodically mourning the loss or distracting from grieving to participate in positive social activities.

There have been studies in grief intervention under the Dual-process model framework. Lund et al. (2010) developed a Dual-process model intervention program to provide a 14-session intervention to recently widowed older women. The intervention group included seven LO and seven RO sessions, while the control group only had LO sessions. However, they found that both intervention and control groups showed decreased grief symptoms, and the difference was not significant. One of the reasons was that the study did not consider the "urgent needs" of the participants. Another study found that "it is difficult for interventions to modify LO, RO, and oscillation, unless there is sufficient intervention dosage and tailored to those exclusively engaged in one process" (Caserta et al., 2014). The study of Chow et al. (2018) involved widowed older adults in Hong Kong who lost their spouse more than 2 years. Participants were assigned into two groups, the dual-process bereavement group intervention-Chinese (DPBGI-C) and the control group, the loss-oriented bereavement group intervention-Chinese (LOBGI-C). Both interventions had weekly, 2-hr sessions for 7 weeks followed by a 4-hr outing in the eighth week. The DPBGI-C group had both LO and RO intervention sessions, while the LOBGI-C group only had LO intervention sessions. The results showed that both interventions had significant grief improvement compared to baseline, and DPBGI-C was statistically superior to the LOBGI-C in reducing grief, anxiety, and loneliness. For the DPBGI-C group, Chinese culture elements were added as restoration topics, such as cooking, Chinese healthy diet, and nutrition. For both groups, the therapeutic ritual of releasing fish was introduced in the last session. These elements made the DPM interventions more adapted to Chinese culture. Chen and colleagues' study (2017) found that the Dual-process model had effectively captured the overall coping mechanisms of Chinese bereaved mothers.

Based on previous studies, the BTP explored an innovative intervention approach to intervene in the Wuhan COVID-19 bereaved individuals under the Dual-process model framework. The BTP considered the characteristics of those bereaved peoples' loss-oriented and RO in different stages with the Chinese sociocultural background and designed a flexible and targeted intervention program.

Methods

It is essential to point out that the BTP was a public welfare program for grief intervention instead of an academic study. The objective of this paper is to review and analyze how the BTP worked and to discuss its results.

Intervention Design

Teaming Social Workers and Professional Mental Health Specialists. The BTP was a psychosocial intervention program organized and implemented by social workers teaming with professional mental health specialists who provided online lectures, advice, and supervision for the BTP's design and process. Psychosocial intervention

has proven to be an effective way of improving grief symptoms (Johannsen et al., 2019; Yu et al., 2020, 2021). Though social workers have not been systematically trained in grief intervention, they have abundant social resources, organizational skills, and social service experiences. With the help of professional mental health specialists, participants could get both social support and psychological intervention, which made the intervention more effective. As professional mental health specialists, especially grief counselors, are a scarce resource in China, the combination of the social workers and professional mental health specialists optimized the resource utilization and improved the quality of the intervention.

Theoretical Framework. The DPM was used as the theoretical framework. In addition to its mature and solid theory, as well as empirical evidence, the DPM framework fits the thinking pattern of Chinese people (Chen et al., 2017). The BTP arranged more RO elements compared to LO elements. From previous studies in the countries or regions where bereavement and grief education are not widely practiced, RO themes are more acceptable and applicable than loss-oriented themes (Caserta et al., 2014; Lundorff et al., 2019). Despite this, the loss-restoration element is necessary, and the BTP kept a rational balance between LO and RO themes according to the Chinese cultural background and the characteristics of Wuhan COVID-19 bereaved people.

Internet Technology. WeChat (similar to Facebook), a very popular and preferred social media app in China, was the main communication tool used in the BTP. All bereaved participants and intervention providers were connected and integrated in one WeChat group. This was different from most offline traditional intervention modes and helped ensure that people could also attend the program remotely. For example, one participant lived abroad, but he could attend online courses, receive remote one-on-one support from social workers, or share thoughts with other participants from WeChat and other internet technologies. Additionally, some courses could be recorded and watched at any time, which overcame the time limitation for participants, and improved the utilization of psychological and social professionals. The applications of internet technology in grief intervention have proven to be effective (Wagner et al., 2020). Given the COVID-19 quarantine requirements, the internet is also a safe and effective tool.

Combination of Group and Individual Intervention. The BTP combined group and individual interventions. Group intervention has some advantages, including relieving loneliness and providing mutual support (Supiano & Luptak, 2014). Nevertheless, some participants might have difficulties expressing their inner thoughts and needs in a group setting for various reasons. Therefore, each social worker kept personal contact (WeChat or telephone) with eight participants on average. Such consistent one-to-one contact helped build trust and provided tailored psychological support in a timely fashion. Each participant received about

15 hours of online one-to-one support from social workers. Compared to most intervention methods which use either group or individual intervention (Chow et al., 2018; Shear et al., 2016), the BTP may point to a new approach for bereavement intervention.

The Supermarket Mode. The BTP adopted a flexible and diversified grief intervention mode called the "Supermarket Mode." Previous grief interventions, as published in the literature, usually used pre-designed intervention procedures with certain themes (Alves et al., 2018; Breitbart & Poppito, 2014; Cohen et al., 2017; Chow et al., 2018; Lund et al., 2010; Saltzman et al., 2017; Shear et al., 2016). The "Supermarket Mode" offered a broad "shopping list" of choices including much more diverse intervention themes and approaches which enabled the participants to proactively choose what they were interested in to address their needs, rather than passively receiving predetermined themes and approaches. When a new intervention element was launched, social workers would post news in the WeChat groups, and participants decided whether to attend or not. For example, female participants preferred dancing therapy, while males could choose not to participate. This flexibility helped solve different kinds of issues and needs for each individual. Usually, grief is a very personal experience. Although the loss is the same, the loss background and coping process usually vary across individuals (Bonanno & Kaltman, 2001). Additionally, the "Supermarket Mode" created some entertaining elements. For example, participants were given a chance to win a prize in a quiz contest after the psychoeducation lectures, for example, "How to Deal with Self-blame." Such activities helped motivate participants to review and to consolidate what they learned.

Rolling Schedule. A dynamic rolling schedule was adopted to design and to enrich intervention themes and approaches according to participants' "urgent needs," to cope with stressors at different times, and to incorporate the availability of the new intervention resources. For example, during the Chinese Lunar New Year festival (which lasts more than 1 week), a new virtual lecture session was added—"How to Cope with the New Year" as a new RO element. In addition, an activity called "New Year's Kitchen" was conducted in which a professional chef was invited to show videos about how to prepare a traditional Chinese New Year's Eve dinner online with participants encouraged to share pictures of their dishes in the WeChat group.

Chinese Elements. Grief varies from culture to culture. Therefore, in coping with grief, great importance should be attached to the characteristics of Chinese culture. Given that Chinese people tend to concern about their health, even more so after the death of a close family member during the pandemic, themes of health-related topics were added as an important part of RO sessions. For instance, "Preservation Health Classes" were provided to the participants almost every

week in the BTP. In addition, offline dinner gatherings, group outings, coordination of traditional Chinese rituals, and selection of relevant books for reading groups, were also included in the BTP.

Participants Recruitment and Background Data

The participants were mainly recruited through WeChat groups spontaneously organized by the COVID-19 bereaved individuals in Wuhan. The information of the BTP was posted in those WeChat groups. The qualifications of participants were as follows:

1. Experiencing the loss of family members in Wuhan during the COVID-19 epidemic.
2. At least 18 years old.
3. Qualified participants were identified by providing a family member's death certificate issued by the government.

After a participant was recruited, a social worker was assigned as a direct contact to the participant, who then was invited to join the BTP WeChat group named "Accompanying and Empowering Group" comprising participants, social workers, and mental health specialists.

There were 45 persons who participated in the BTP WeChat group at different points of time, with 3 (6%) dropping out, and 25 (55.5%) of the participants voluntarily completing three-time points of data collection. Demographic information of the participants is presented in Table 1.

Intervention

The intervention comprised both loss-oriented and RO themes. Each theme had different approaches and took into consideration the participants' "urgent needs." Some themes, such as health-related ones, existed throughout the whole program. The themes and approaches of the intervention are shown in Table 2.

Though RO1 was instrumental support, it had a positive psychological effect on the participants and made them feel the warmth of the social support.

Loss-oriented5 & restoration-oriented11 psychoeducation had eight sessions: 1. How to practice self-health care during acute grief; two Grief is a form of love; 3. What is normal grief and PGD; 4. Grief and depression; 5. Positive rituals; 6. How to handle the deceased's belongings; 7. Child grief and what surviving parents can do; and 8. Cognitive, behavior and emotional adjustment. Some online sessions were provided only to the participants, and some sessions were open to the public.

Table 1. Demographic and Sample Characteristics.

	Total sample (n = 42)	Participants who completed three-time points of data collection (n = 25)
Mean age, years (SE)	45.64 (12.07)	43.72 (11.04)
Gender, N (%)		
Female	35 (83.3%)	20 (80.0%)
Male	7 (16.7%)	5 (20.0%)
Education, N (%)		
Below high school	9 (21.4%)	4 (16.0%)
High school	8 (19.0%)	4 (16.0%)
Above high school	25 (59.5%)	17 (68.0%)
Marital status, N (%)		
Single	7 (16.7%)	5 (20.0%)
Married	20 (47.6%)	13 (52.0%)
Divorced	1 (2.4%)	0 (0.0%)
Widowed (losing husband)	13 (31.0%)	7 (28.0%)
Widowed (losing wife)	1 (2.4%)	0 (0.0%)
COVID-19 status, N (%)		
Not confirmed as transmitted	20 (47.6%)	8 (32.0%)
COVID-19 rehabilitation	22 (52.4%)	17 (68.0%)
Religious, N (%)		
Yes	8 (19.0%)	5 (20.0%)
No	34 (81.0%)	20 (80.0%)
Mean age of the deceased (SE)	62.74 (14.35)	64.04 (10.40)
Bereavement length, month, (SE)	6.17 (0.70)	6.04 (0.74)
Relationship with the deceased N (%)		
Parent	25 (59.5%)	16 (64.0%)
Spouse	13 (31.0%)	7 (28.0%)
Sibling	1 (2.4%)	0 (0.0%)
Child	1 (2.4%)	0 (0.0%)
Parent-in-law	2 (4.8%)	2 (8.0%)

Data Collection and Analysis

The Inventory of Complicated Grief (ICG-19) (Prigerson et al., 1995) was used to assess the grief symptoms. This inventory adopted a 5-point Likert scale (0 = never, 4 = always). Higher scores demonstrated more severe grief symptoms. Li and Prigerson (2016) found that Chinese ICG has sound validity and high internal consistency, and the cut-off score for the potential PGD "caseness" was 48.

Data collection was conducted in three specific time frames, that is, Baseline T1 (from August 2020 to October 2020), T2 (from January 2021 to February 2021), and T3

Table 2. Intervention Themes and Approaches.

Item	Loss-oriented intervention	Recovery-oriented intervention
I		RO1 Financial support (cash and milk powder)
3		RO2 online therapeutical mindfulness lessons (5 times) and yoga classes (8 times)
4		RO3 Food and life (online 11 times)
5		RO4 dancing therapy (online 8 times and 1 in the park)
6		RO5 Preserve health lectures (online 38 times)
7		RO6 offline gathering: "Find the value of life: nature, food and dancing" (9 times)
8	½ LO1 Memory ceremony on the zhongyuan festival (online)	½ RO7 Memory ceremony on the zhongyuan festival (online)
9	½ LO2 write the child a letter on christmas eve (in WeChat group)	½ RO8 write the child a letter on christmas eve (in WeChat group)
10	½ LO3 how to cope with the new year (WeChat group)	½ RO9 how to cope with the new year (WeChat group)
11	½ LO4 heart healing reading (25 times in WeChat group)	½ RO10 heart-healing reading (25 times in WeChat group)
12	½ LO5 online psychoeducation (8 sessions in WeChat group)	½ RO11 online psychoeducation (8 sessions in WeChat group)

(from June 2021 to July 2021). 25 participants completed the survey for all three-time frames, and their intervention data were included in the analysis. The other 17 participants' intervention data were not included in the analysis since they did not complete all the three-time point surveys.

Data were analyzed using IBM SPSS 23.0. First, the normality test indicated that the T2 and T3 data showed a skewed distribution. Thus, we adopted the paired-sample Wilcoxon test to compare T1 values with T2 and T3 values to assess the changes of interventions at different stages. The size effect was assessed by Cohen's r (Rice & Harris, 2005), following Cohen's classification of effect sizes which is 0.1 (small effect), 0.3 (moderate effect), and 0.5 and above (large effect).

Results

The difference of average ICG scores between T1 and T2 was not significant ($p = 0.061$; Cohen's r = 0.37), and that between T2 and T3 was significant ($p = 0.001$; Cohen's r = 0.71).

When comparing the prevalence of the potential PGD diagnosis across the three-time points, we found that the difference was not significant between T1 and T2 ($p = 0.564$; Cohen's r = 0.11), but significant between T2 and T3 ($p = 0.005$; Cohen's r = 0.56). The results are presented in Table 3.

Table 3. Mean, SEs, and Effect Sizes for the Intervention Analysis.

	According to ICG scores	According to the prevalence of potential PGD diagnosis
Baseline (T1) (mean [SE])	41.92 (4.15)	12 (48.0%)
Medium assessment (T2) (mean [SE])	38.72 (4.78)	11 (44.0%)
Postintervention (T3) (mean [SE])	23.48 (3.60)	3 (12.5%)
Z score for T1-T3 change	3.91 ($p < 0.001$)	3.000 ($p = 0.003$)
Effect-size (r) for T1-T3 change	0.78	0.60
Z score for T1-T2 change	1.42 ($p = 0.16$)	.58 ($p = 0.564$)
Effect-size (r) for T1-T2 change	0.28	0.11
Z score for T2-T3 change	3.55 ($p < 0.001$)	2.83 ($p = 0.005$)
Effect-size (r) for T2-T3 change	0.71	0.56

Note. ICG = Inventory of Complicated Grief; PGD = Prolonged Grief Disorder.

Table 4. ICG Mean, SEs, and Effect Sizes for the PGD and Non-PGD Groups.

	PGD (N = 12)	Non-PGD (N = 13)
Baseline (T1) (mean [SE])	60.25 (2.61)	25.00 (3.27)
Medium assessment (mean [SE])	54.25 (5.37)	24.38 (5.27)
Post-intervention (T3) (mean [SE])	32.25 (5.66)	15.38 (3.36)
Z score for T1-T3 change	2.85 ($p = 0.004$)	2.70 ($p = 0.007$)
Effect-size (r) for T1-T3 change	0.57	0.54
Z score for T1-T2 change	0.66 ($p = 0.507$)	1.16 ($p = 0.25$)
Effect-size (r) for T1-T2 change	0.13	0.23
Z score for T2-T3 change	2.98 ($p = 0.003$)	1.75 ($p = 0.08$)
Effect-size (r) for T2-T3 change	0.59	0.35

Note. ICG = Inventory of Complicated Grief; PGD = Prolonged Grief Disorder.

We further divided the participants into PGD and non-PGD groups according to the ICG cut-off scores (48) of baselines and then tested the ICG score differences across three-time points. The results indicated that, for the PGD group, the T1-T2 difference of ICG score was not significant ($p = 0.507$; Cohen's r = 0.13), but the T2-T3 difference was significant ($p = 0.003$; Cohen's r = 0.59). For the non-PGD group, neither T1-T2 nor the T2-T3 differences were significant. The results demonstrated that the BTP was more effective for people with more severe grief reactions. The results are presented in Table 4.

Discussion

The present study examined the intervention efficacy of a psychosocial program organized for Chinese COVID-19 bereaved people from Wuhan. Overall, the results showed that grief symptoms reduced after the "Be Together Program" intervention. Specifically, the intervention benefited those who have more severe grief symptoms.

The prevalence of the possible PGD diagnosis in our sample at T1 was 48.0%, which is higher than generally bereaved Chinese people (13.9%) (Li & Prigerson, 2016). Another study conducted in the broader area of China reported that the prevalence of the potential PGD diagnosis among COVID-19 bereaved people was 37.8% (according to the International Prolonged Grief Disorder Scale) and 29.3% (according to Traumatic Grief Inventory - Self Reported) (Tang & Xiang, 2021). Although Tang and Xiang's study (2021) and our study for the BTP did not use the same assessment tools, the high PGD prevalence still implies that grief reactions among COVID-19 bereaved people in Wuhan may be more complicated and persistent compared to general bereaved people and COVID-19 bereaved people in other areas of China. The high prevalence of the potential PGD diagnosis in our sample may be related to Wuhan being the first large city where the COVID-19 epidemic occurred. In addition, most participants (92%) in the BTP lost their parents or spouses, and these close relationships have been found to correlate with elevated grief symptoms (He et al., 2014).

Inventory of Complicated Grief scores decreased significantly from T1 to T3 with large effect size, demonstrating that the BTP intervention effectively improved COVID-19 bereaved people's grief symptoms. In Tang and Xiang's (2021) study, no significant differences were found for grief scores between COVID-19 bereaved individuals for less than 6 months and for more than 6 months. This implies that for COVID-19 bereaved individuals, grief symptoms may not decrease without adequate intervention, at least in Tang and Xiang's sample. The current study shows that integrated psychosocial intervention is promising to reduce COVID-19 bereaved people's grief.

When analyzing the intervention efficacy in different stages, we found that the grief symptom decrease was not significant from T1 to T2, but significant from T2 to T3. The results indicate that the intervention effect may begin to emerge from T2, or the intervention effect was not evident in the T1-T2 stage. Two reasons may explain the result. First, for the T1-T2 stage, the BTP focused on building one-on-one trustful relationships between social workers and participants through online companionship, group outings, and health-nutrition lectures which were the central themes in the intervention. However, it appears that those types of interventions alone were not enough to reduce grief symptoms. Nonetheless, this stage was a very critical first step for the effective intervention in the T2-T3 stage since it helped build up a safe group support environment. Second, from T2-T3, in addition to the themes used in T1-T2, additional elements relevant to LO and RO were introduced, such as grief psycho-education, "Heart Healing Reading," and dance therapy. These added elements may contribute to the significant change of the grief symptoms. It has been proven that

psychoeducation is one of the most effective elements in grief intervention (Roberts & Montgomery, 2016; Shear et al., 2005). The "Heart Healing Reading Group" created a safe environment for participants to effectively share their thoughts about coping with LO and RO stresses. Dance therapy has also proven effective for bereaved people (Chow et al., 2018; Dominguez, 2018; Philpott, 2013; Thompson & Neimeyer, 2014).

When analyzing the ICG score changes in the PGD and non-PGD groups separately, we found that ICG scores of both groups decreased from T1 to T3 significantly. This suggests that the BTP seems to be effective for both groups. However, the two groups presented different modes. For the PGD group, grief symptoms decreased significantly and largely from T2 to T3. For the non-PGD group, although grief symptoms declined from T2 to T3, the change was not significant. These results imply that the added loss-oriented elements with grief specific intervention in T2-T3 may be more beneficial for bereaved people with PGD than those without. According to Neimeyer and Currier's study (2009), grief-specific intervention is more helpful for those with more severe grief symptoms, and for those with fewer grief symptoms, grief-specific intervention may not be beneficial or may even be harmful. Our findings are consistent with these findings to some extent.

The BTP lasted for 10 months, to the best of our knowledge, much longer than any other group grief interventions yet published in the literature. However, the dropout rate was only 6%, which was much lower than we initially assumed. At the end of the program, a survey was conducted to collect participants' feedback for each element used in the program. We found that the average ratings of each element were above 4 (5 being the highest score), which, on the one hand, meant that participants were satisfied with BTP, and on the other hand, can be interpreted as the positive effects of the BTP. From the survey, we also noticed that participants were more favorable to RO intervention themes and approaches.

After the BTP program was over, as requested by participants, the BTP WeChat group was not disbanded. A social worker continues to provide supportive information (e.g., local news, health related information) in the group, where participants can encourage each other and facilitate self-empowerment.

Limitations

First, the BTP was a public welfare program aimed to help COVID-19 bereaved people adapt to the unprecedented tragic bereavement reality in Wuhan; therefore, there was no control group in the BTP. We could not exclude the possibility that the decrease of grief symptoms was due to natural recovery. Future research is still needed to verify our conclusions by employing a randomized controlled trial design. Second, the sample was recruited mainly from the WeChat group spontaneously organized by the COVID-19 bereaved individuals in Wuhan rather than randomly. Third, the qualified sample size was small, and only 25 participants completed the survey across three-time points. The representativeness of the sample may be biased. Fourth, a follow-up survey is still needed to examine the long-term efficacy of the BTP.

Conclusion

Despite these limitations, the present study indicated that under the DPM framework, loss-oriented and RO intervention themes could be employed in much more flexible and innovative approaches given different cultural backgrounds. Our study found that the BTP could easily adopt the "Supermarket Mode" by adding Chinese cultural elements under the Dual-process model framework. The usage of new internet technology and a combination of group and individual intervention also helped make the BTP more efficacious.

The evidence-based findings from our pilot study contribute some enlightening insights for future grief intervention in the context of COVID-19 or other large-scale disaster events for researchers and practitioners from different cultural backgrounds.

Declaration of Conflicting Interests

The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

ORCID iDs

Ningning Zhou https://orcid.org/0000-0002-5680-2446
Xinxian Liu https://orcid.org/0000-0002-2360-6713

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