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# *HEAL*ing transgender women of color in Los Angeles: A transgender-centric adaptation of the evidence based practice *Seeking Safety*

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**ABSTRACT**

***Background:*** Transgender women of Color experience disproportionate rates of HIV, depression, and anxiety, and high rates of substance use, attempted suicide, and interpersonal verbal, physical, and sexual violence and assault. However, there are few interventions targeting transgender women of Color that address overlapping health and mental health challenges.

***Aims:*** There are two aims/research questions: (1) what are the elements of a transgender-centric translation model for adapting evidence based interventions and practices?, and (2) does *HEAL* improve substance use and mental health outcomes for transgender women of Color?

***Methods:*** We present a case study of the adaptation process to translate the evidence based practice *Seeking Safety* by Special Service for Groups/Asian Pacific AIDS Intervention Team (SSG/APAIT) to the transgender-centric *HEAL* (Healing, Empowering, And Living) program, and analyze baseline and three month post program participant data ($n = 81$).

***Results:*** The transgender-centric model of intervention adaptation consisted of multiple steps, building on existing adaptation frameworks, but also integrating the structural disadvantages experienced by transgender women of Color. Comparing baseline and three months after completion of *HEAL* showed significant decrease in reported alcohol use, depression, and severe anxiety.

***Discussion:*** Transgender-centric translation approaches may lead to programs that significantly improve co-occurring substance use and mental health for transgender women of Color. We recommend that organizations aiming to adapt existing programs include feedback from members of the communities that the adapted programs aim to help, and in addition, train community members to deliver the programs. The statistical results indicate that *HEAL*, a trauma-based program with a short program delivery timeline, may show longer term effects on substance use and mental health. We recommend that programs targeting substance use and mental health for transgender women of Color should be combined with services that address disadvantage (i.e., lack of access to housing, income/employment, health care).

**KEYWORDS**
Los Angeles; mental health; substance use; transgender centric adaptation; women of color

## Introduction

A growing body of research has shown that transgender women of Color experience disproportionate rates of HIV, depression, and anxiety, and high rates of substance use, attempted suicide, and interpersonal verbal, physical, and sexual violence and assault (Hughes & Eliason, 2002; Kenagy, 2005; McDevitt et al., 2001; Reback et al., 2018; Safer et al., 2016; Shipherd et al., 2011). These disparities in physical and mental health are exacerbated by discrimination within the healthcare system, including provider reluctance to provide medical services and being "pathologized by diagnostic and assessment systems" (Burnes et al., 2010, p. 138; also Bradford et al., 2013; Heng et al., 2018; Poteat et al., 2013).

### *Designing and delivering transgender-centric health interventions*

Severe health disparities and discriminatory health care practices have motivated calls for designing and delivering appropriate mental and physical health care services for transgender women (Bockting et al., 1998). Trauma, discrimination, and

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stigma create multiple and overlapping physical and mental health challenges for this population, which need to be addressed concomitantly for longer-term impact. There are few programs or interventions targeting transgender women of Color that address overlapping physical and mental health challenges, such as co-existing behavioral health issues (e.g., substance use and mental disability).

Many service providers targeting co-existing physical and mental health issues, or co-morbidities, for transgender women of Color are adapting existing programs. The need to rigorously adapt existing programs for varied populations and needs has led to several conceptual models to guide program translation, such as RE-AIM, ADAPT-ITT, and others (Glasgow et al., 2003; Neumann & Sogolow, 2000; Wingood & DiClemente, 2008). Common elements in these and other translation models are an emphasis on the organizational content of the implementing agency, role of key stakeholders in the implementation process, fidelity to the designed procedures and curriculum, and assessment of adaptations and their impact on organizational and behavioral outcomes.

There remain important questions about the effectiveness of processes and outcomes of adapted programs and interventions. Research on diverse populations has shown mixed results in terms of outcomes (Castro et al., 2010). The reasons for a lack of significant health improvements through adapted programs are not clear because research on efficacy trials rarely includes information or data about organizational factors and their effects on implementation (Ginexi & Hilton, 2006; Kraft et al., 2000; Norton et al., 2009). Organizational readiness, structure, size, staff turnover, leadership and decision-making processes are key factors that may influence implementation of adapted interventions. However, measures of fidelity (alignment between the designed and implemented program or intervention) often miss such key factors (Solomon et al., 2006).

### *Seeking safety for transgender women of color: a case study approach*

To address these gaps in research and practice, we present a case study of the adaptation process to translate the evidence based practice *Seeking Safety* by Special Service for Groups/Asian Pacific AIDS Intervention Team (SSG/APAIT) to the transgender-centric *HEAL* (Healing, Empowering, And Living) program, and analyze participant data from this adapted program. Two of the authors (Candelario and Proff) are or were senior administrators for SSG/APAIT and supervised the staff that delivered *HEAL*.

The goals of *HEAL* were to reduce substance use and improve mental health for transgender women of Color in Los Angeles. In this paper, we address the following research questions: (1) what are the elements of a transgender-centric translation model for adapting evidence based interventions and practices?, and (2) does *HEAL* improve substance use and mental health outcomes for transgender women of Color? To analyze *HEAL's* effectiveness, an analysis of quasi-experimental data was conducted; the quasi-experimental data consisted of measuring mental health and substance use prior to and three months after completion of the program.

To answer these questions, the remainder of the paper consists of the following sections. First, we outline the process used to adapt *Seeking Safety* to *HEAL*, using a transgender-centric process of adaptation. Second, we describe the quasi-experimental data and statistical methods for analyzing *HEAL*'s program effects. Third, we analyze the outcomes of *HEAL* for its eighty-one transgender women of Color participants, focusing on substance use in the past 30 days (alcohol and/or illegal drugs) and serious depression and/or serious anxiety in the past 30 days. Finally, we conclude with a summary of the results and recommendations for practice and further research.

## Research question 1: what are the elements of a transgender-centric translation model?: From *Seeking Safety* to *HEAL*

### *Seeking safety: evidence based practice*

*Seeking Safety* is a group level evidence based practice that uses five guiding principles (Najavits, 2002). The first principle is that establishing "safety" is the primary therapeutic task or treatment, and consists of a present-time orientation, groups characterized by homogeneous or same primary diagnoses, low tolerance for group

conflict and moderate cohesion within the group, and didactic intent in the group sessions with an open-ended format. The second principle consists of integrated treatment of post-traumatic stress disorder (PTSD) and substance abuse instead of a sequential model where disorders are treated one at a time or by different clinicians. The third principle is a focus on "ideals"; *Seeking Safety* seeks to restore ideals, such as honesty, commitment, and respect, that have been lost due to post-traumatic stress disorder (PTSD) and substance use. The fourth is that *Seeking Safety* is informed by cognitive behavioral therapy (CBT), and therefore has four content areas: cognitive, behavioral, interpersonal, and case management. Using these content areas, *Seeking Safety* is designed to be brief, time-limited, and structured, with the aim of observable outcomes over a short time frame. The fifth and final principle is attention to the therapeutic process, which includes building alliances, compassion for participant experience, giving participants control whenever possible, modeling self-control and coping by meeting the participant more than halfway, and obtaining feedback from participants.

Each *Seeking Safety* session consists of four basic elements. The first element, "Check-in," serves to identify issues from participants that are incorporated into the content of that session. *Seeking Safety* includes 25 topic areas, including opening and closing topics ("Introduction to Treatment/Case Management" and "Termination") and substantive topics (e.g., "Safety," "Honesty," "Respecting Your Time"). The second element, "The Quotation," consists of a selected quotation that exemplifies the theme of the session. Participants are asked to read the quotation aloud, which then leads to discussion about the quotation. The third element, "relating the topic to patient's lives," consists of program participants reviewing session handouts and discussing the material regarding how the topic applies to their lives. This discussion consists of problem identification, walking through steps for problem solving, including role playing, and brainstorming about rethinking the issue or problem. The fourth and final element, "Check-out", asks participants to discuss the value of the session, to identify a new commitment to recovery ("Check-in" at the following session returns to this new commitment to ascertain whether and to what degree the participant is meeting her commitment), and to remind participants about case management goals.

*Seeking Safety* has been evaluated in terms of its effectiveness with varying populations. Some qualitative and quasi-experimental studies show promise for *Seeking Safety* in improving PTSD and substance use (Gatz et al., 2007; Marsh et al., 2016), although the length of time in treatment and retention in the program can influence outcomes (Amaro et al., 2007). However, larger randomized controlled trials (RCTs) have shown mixed results. RCTs leverage the use of two groups similar in background and needs that are randomly assigned, with one group receiving the program and another receiving a different program or no program. A small sample RCT with 33 adolescent girls showed promising effects on reducing PTSD and substance use (Najavits et al., 2006). Other RCTs, however, either showed no differences in PTSD and substance use outcomes compared to a conventional health education program (Hien et al., 2009), or showed improvements in specific areas and not in others (e.g., substance use but none in PTSD or alcohol use; Boden et al., 2012).

## Developing a transgender-centric process of adapting seeking safety

The transgender-centric model of adaptation described in this section included experience working with the community, research and evaluation data, and an iterative feedback process that included community members, staff, and participants.

### Community experience

SSG/APAIT, the community based organization that adapted *Seeking Safety* to meet the needs of transgender women of Color in Los Angeles, has a long history of creating and adapting programs for transgender individuals. SSG/APAIT began providing services to the Los Angeles transgender community in 1996 with support from the local HIV health department and later in 1999 from the Centers for Disease Control and Prevention

(CDC) to address multiple co-occurring health issues, such as sexually transmitted infections (STI) and HIV, substance use, and mental health issues. SSG/APAIT has designed and delivered four programs for transgender women of Color since the late 1990s aiming to enhance HIV prevention and testing, empowerment, workforce development, and linkage to existing housing and services.

### Adaptation process

The process of adaptation began with collecting data and reviewing existing knowledge: (1) internal SSG/APAIT evaluation reports from previous HIV and behavioral health programs targeting the transgender community in Los Angeles County; (2) focus groups conducted by SSG/APAIT staff with transgender individuals and other stakeholders (i.e., SSG/APAIT staff, volunteers, board members, and funders); and (3) published research and epidemiology reports. These resources highlighted the complex and multiple layers of oppression faced by transgender women of Color in Los Angeles including intimate partner violence (IPV), homelessness and low socioeconomic status, co-occurring HIV, substance use and mental health challenges, and discrimination in multiple settings such as employment, housing, and health services (Reback et al., 2018). In particular, with respect to substance use, one study found that transgender women in Los Angeles report high rates with cannabis (54%), alcohol (40%), methamphetamines (28%), and cocaine (10%) as the leading drugs of choice, as well as high HIV (35.4%) and STI lifetime prevalence (24% for gonorrhea, 26% for syphilis, and 18% for chlamydia; Reback et al., 2018).

After reviewing these resources, SSG/APAIT senior leadership identified *Seeking Safety* as a potential candidate for adaptation. SSG/APAIT staff who would be Counselors/Group Facilitators for *HEAL*, and who were themselves transgender women of Color, then reviewed *Seeking Safety* for applicability and relevance. Based on this review, there were two substantive revisions to *Seeking Safety* resulting in the adapted *HEAL* program design: (1) the addition of individual counseling and coaching interventions for *HEAL* participants and alumni, and (2) the reduction of the number of group sessions.

First, *HEAL* included voluntary individual counseling to augment the *Seeking Safety* core treatment (i.e., group sessions). The adaptation provided additional individual counseling, case management, and aftercare sessions for those participants who wanted additional engagement. *HEAL* program participants could voluntarily attend weekly 60-minute individual counseling sessions conducted by an SSG/APAIT licensed clinical social worker (LCSW) to further discuss *HEAL* topics by addressing underlying trauma that might be difficult to discuss in a group setting. *HEAL* also included case management and aftercare sessions.

Transgender women of Color in Los Angeles are severely disadvantaged, and based on prior program evaluations, SSG/APAIT determined that many *HEAL* program participants would need care coordination and/or social services assistance (e.g., referrals to food assistance, employment development and placement, housing, childcare, and legal services). Because of the ways in which severe disadvantage might create obstacles to program participation, *HEAL* integrated case management, designed to work collaboratively with program participants to create a case management action plan, and provided appropriate referrals and linkages to accessible services, including SSG/APAIT's on-site services (including HIV testing and counseling, HIV prevention programs, HIV specialty care via onsite clinic partner, primary care via onsite clinic partner, housing assistance, social support programs, patient navigators, and benefits counseling). To reduce obstacles to service use, *HEAL* Counselors would follow-up regularly with *HEAL* program participants, as well as coordinate care with service providers outside SSG/APAIT (e.g., nearby clinics and hospitals, substance use treatment programs, homeless shelters, women's programs, and other community based social support programs). As part of the adaptation, *HEAL* Counselors would provide one-on-one coaching during case management services to improve participant skills in achieving *HEAL* program commitment goals, such as accessing health care and health information, budgeting, job-seeking, and

medication adherence. To ensure sustained program results, aftercare sessions were also designed as part of *HEAL* to target *HEAL* program alumni. In these sessions, *HEAL* program alumni were to be trained by *HEAL* Counselors to serve as peer facilitators for the aftercare group, which would meet onsite at SSG/APAIT, and would offer *HEAL* program alumni a place to continue accessing group support to maintain substance use abstinence.[1]

Second, *HEAL* was designed to be completed in twelve weeks (rather than the 25 sessions indicated in the *Seeking Safety* design), taking advantage of the flexible nature of *Seeking Safety* (Najavits, 2002). The length of treatment and number of sessions offered in other *Seeking Safety* adaptations has varied, with a common iteration being twice weekly sessions for twelve weeks (Hien et al., 2004; Najavits et al., 1998; Zlotnick et al., 2003). However, in a previous outpatient substance abuse treatment program, SSG/APAIT experienced high attrition with a twice weekly program longer than twelve weeks (SSG/APAIT's SAMHSA-funded *Team 360*, delivered from 2008 to 2013). SSG/APAIT consequently decided that a once a week program completed within twelve weeks would be better suited to transgender women of Color who were experiencing substance use and mental health issues.

*HEAL* reduced the number of *Seeking Safety* sessions using the following strategy. *HEAL*'s first five weeks followed *Seeking Safety*'s first five topics to provide the foundation for *Seeking Safety's* guiding principles. *HEAL*'s weeks 6 to 11 used topics from *Seeking Safety*'s topics 6 to 24 in accordance with participant feedback and in response to issues brought up by *HEAL* participants in the first five weeks. Depending on participant feedback and group dynamics, two of the *Seeking Safety* topics were sometimes addressed in one 90-minute session. Finally, *HEAL*'s week twelve followed *Seeking Safety*'s topic 25 consistently.

### Implementation of the adapted HEAL program

*HEAL* program participants attended 90-minute group sessions weekly for twelve weeks. Each cohort consisted of approximately ten transgender women of Color. Initially, *HEAL* cohorts included both cisgender and transgender women of Color, but the cisgender and transgender women did not forge sufficient group cohesion, so *HEAL* Counselors decided to separate the cohorts into cisgender and transgender groups. We focus on the transgender cohort results for this analysis.

Each transgender *HEAL* session was facilitated by a Counselor who was a transgender woman of Color, and in many cases, bilingual in Spanish and English. Transgender groups were closed so that the cohort began and ended with the same members. If participants missed a group session, they had the option to complete a "make-up session" with a Counselor on a one-on-one basis. *HEAL* used the Spanish language *Seeking Safety* manual for Spanish-speaking *HEAL* participants, as many of the participants were monolingual Spanish speakers.

This format allowed the transgender women of Color participants to give and receive feedback, build trust and group cohesiveness, and explore new behaviors in a safe environment. However, there were tensions related to age, with younger and older transgender women participants often clashing. *HEAL* Counselors acted as mediators to bridge the generational gaps and used these issues to highlight particular topics in the workshops. *HEAL* Counselors asked the two groups to share their lived experiences as it pertained to the topic. Older participants were asked to share their past experiences and what help (or lack thereof) was available at the time and contextualized these experiences based on that time period; younger participants shared what challenges they faced in comparison. *HEAL* Counselors used these opportunities to expand dialogue and trust, and to build cohesion in the group.

## Methods

### Data collection

The overall target population for *HEAL* was cisgender and transgender women of Color, ages 18 and older, residing in Los Angeles County, who were at risk for or living with HIV or AIDS. *HEAL* participants were recruited through internal referrals from other SSG/APAIT or SSG programs, from a previously co-located

community health center, or from general outreach activities in the Los Angeles transgender community. *HEAL* Counselors assessed these referred individuals for *HEAL* program eligibility.

This analysis uses a quasi-experimental design to assess the possible effects of *HEAL* for transgender women of Color. All eligible program participants met with a *HEAL* Counselor on an individual basis to complete the program's data collection at baseline, discharge (i.e., T2: completion of program at twelve weeks/three months from baseline), and follow-up (i.e., T3: assessment at six months from baseline, or three months from program completion). For each completed assessment (at baseline, discharge, and/or follow-up), participants received a non-cash incentive valued at $20 (i.e., gift cards). Incentives were used to encourage participation in data collection. All data were provided voluntarily, and participants had the option to refuse participation in data collection, while still participating in *HEAL*. No participants refused to participate in data collection, though some refused to answer specific questions (e.g., race, income, and PTSD).

### Demographic variables

Prior to participation in *HEAL*, eligible individuals completed the US Substance Abuse and Mental Health Services Administration (SAMHSA) Center for Substance Abuse Treatment (CSAT) Government Performance and Results Act (GPRA) Client Outcome Measures for Discretionary Programs,[2] which assesses demographic information (self-reported age, housing, income, education, employment status) and legal issues (including immigration and criminal justice status).

### Characteristics of the transgender women of color HEAL participants

The analytic sample included eighty one transgender women of Color *HEAL* participants who completed baseline and two follow-up visits (program completion/discharge and three months post program completion/discharge). Table 1 summarizes the demographic and substance use characteristics of the participants. The mean age of the participants was 44.2 years ($SD = 12.5$) and all reported transgender identity (100%). The majority identified as Hispanic/Latina (70%), reported that they were not employed (78%) and reported that they were living in residential housing (consisting of sober living facilities, recovery housing or shelters) (79%). More than two-thirds reported that they had twelve years or more of education. Substance use was not prevalent, with only 28% of participants self-reporting any marijuana use in the past 30 days and most reporting no use of crack, opiates or methamphetamines. *HEAL* Counselors also noted in their program notes that the transgender women of Color program participants did not see substance use as an urgent problem.

### Substance and alcohol use, mental health, sexual risk, and social connection measures

The outcome measures of interest were: self-reported number of days alcohol and/or illegal drugs used in the prior 30 days and number of days experienced serious depression and/or serious anxiety in the prior 30 days. Substance and alcohol use in the past 30 days were measured by asking, "How many days did you use alcohol/illegal substances?" Participants also reported the number of days that they experienced depression and anxiety in the prior 30 days. Sexual practices were assessed with two questions, "Did you engage in any sexual activity?", and if yes, "how many unprotected sexual contacts did you have?" For the analysis, an indicator variable was created with 0 = no sexual activity, 1 = all sexual activity was protected, 2 = any sexual activity unprotected. Finally, social connectedness was measured with the question, "Do you have any friends or family who are supportive of your recovery (yes versus no)?" *HEAL* program participants with co-occurring mental health disorders as well as co-occurring medical conditions, such as HIV/AIDS and/or viral hepatitis, were treated within the scope of *HEAL* and SSG/APAIT's onsite medical and behavioral health services. Individuals assessed as needing a higher level of care were not eligible for participating in *HEAL* and were referred to more intensive local inpatient programs, residential treatment programs, or hospital inpatient care.

**Table 1.** Baseline characteristics of 81 participants in the HEAL intervention.

| Variable | *Mean (SD)* | *[IQR]* |
|---|---|---|
| Mean age (*SD*) [*IQR*] | 44.2 (12.5) | [35-52] |
| | ***N*** **(%)** | % |
| Gender: Transgender | 81 | 100 |
| Hispanic | | |
| No | 24 | 30 |
| Yes | 57 | 70 |
| Education | | |
| ≤11 years | 26 | 33 |
| 12 years | 25 | 31 |
| ≥13 years | 29 | 36 |
| Employment | | |
| Employed | 18 | 22 |
| Not employed | 63 | 78 |
| Housing status | | |
| Living in own house/apartment | 9 | 11 |
| Living in someone else's house/apartment | 2 | 2 |
| Residential facility | 64 | 79 |
| other | 6 | 7 |
| Arrested in the past 30 days | | |
| No | 80 | 99 |
| Yes | 1 | 1 |
| Used marijuana in past 30 days? | | |
| No | 58 | 72 |
| Yes | 23 | 28 |
| Crack | | |
| No | 76 | 95 |
| Yes | 4 | 5 |
| Used opiates in past 30 days? | | |
| No | 81 | 100 |
| Yes | 0 | 0 |
| Sexual risk behavior in past 30 days (missing 8 cases) | | |
| No sexual contact | 30 | 41 |
| Sexual contact – protected | 26 | 36 |
| Sexual contact – not protected | 17 | 23 |
| Have friends or family who are supportive of your recovery (missing 3 cases) | | |
| No | 49 | 63 |
| Yes | 29 | 37 |

*HEAL* also included mandatory and voluntary screening at intake and during program implementation. *HEAL* voluntary screening included HIV and viral hepatitis testing at intake. Due to the high likelihood of co-occurring substance abuse and HIV and/or viral hepatitis infection for transgender women of Color, rapid HIV and hepatitis B/C testing were offered to all *HEAL* program participants during intake. All information obtained from intake assessments were used by *HEAL* Counselors and participants to develop appropriate treatment plans for both group (core treatment program) and individual sessions (voluntary). As this was a direct service program, and not a research project, there was no review by IRB.

### *Data entry and quality assurance*

SSG/APAIT staff entered data collected via the SAMHSA CSAT GPRA Client Outcome Measures for Discretionary Programs into the Services Accountability Improvement System (SAIS) within seven business days of data collection.

### *Analysis*

Univariate statistics were conducted of the de-identified participant data to examine frequencies of all variables. At baseline, income and HIV testing variables were missing 19% and 21% respectively and were not included in the results. To examine changes in substance use and mental health over time, we conducted t-tests comparing baseline scores to T3 (six months from baseline or three months from program completion/discharge).

## Research question 2: did *HEAL* improve substance use and mental health outcomes?

### *Changes in drug and alcohol use*

We focused on the changes observed from baseline to three months after completion of the

**Table 2.** Changes in outcomes among 81 participants of the HEAL program from baseline to three months after program completion.

| Variable | T1 *Mean (SD)* | T2 *Mean (SD)* | T3 *Mean (SD)* | *p*-value* |
|---|---|---|---|---|
| Number of days used alcohol in past 30 days | 6.73 (9.32) | 2.31 (3.58) | 2.01 (4.03) | <0.001 |
| Number of days used illegal drugs in past 30 days | 6.20 (11.0) | 6.13 (11.4) | 3.76 (9.11) | 0.13 |
| Number of days experienced depression in past 30 days | 7.26 (8.30) | 5.10 (8.88) | 4.56 (9.08) | 0.05 |
| Number of days experienced serious anxiety in past 30 days | 8.95 (9.69) | 5.63 (9.41) | 3.95 (8.59) | <0.001 |
| *ttest T1-T3 | | | | |

*HEAL* program (Table 2). We observed statistically significant decreases in the mean number of days alcohol used in the previous 30 days from 6.73 days ($SD = 9.32$) at baseline to 2.01 days ($SD = 4.03$) at three months from completion of *HEAL* program participation ($p < 0.001$) (Table 2). The number of days of illegal drug use also declined from baseline to three months from completion of the *HEAL* program, but this change was not statistically significant (6.20 days ($SD = 11.00$) in the previous 30 days at baseline to 3.76 days ($SD = 9.11$) in the previous 30 days at three months from program completion; $p = 0.13$).

### Changes in mental health

From baseline to three months after *HEAL* program completion, we observed a statistically significant decrease in the number of days reported by participants of serious depression and anxiety. At baseline, transgender women of Color participants reported that they experienced depression an average of 7.26 ($SD = 8.30$) days in the previous 30 days; this declined in the three months after *HEAL* program completion to experiencing depression an average of 4.56 days ($SD = 9.08$) in the previous 30 days ($p = 0.05$). An even more significant result was observed for serious anxiety ($p < 0.001$). At baseline, *HEAL* participants reported that they experienced serious anxiety an average of 8.95 days ($SD = 9.69$) in the previous 30 days, while three months after *HEAL* program completion, they reported experiencing serious anxiety an average of 3.95 days ($SD = 8.59$) in the previous 30 days.

## Discussion

This paper addressed two research questions: (1) what are the elements of a transgender-centric translation model for program adaptation?, and (2) does *HEAL* improve substance use and mental health outcomes for transgender women of Color?

For research question 1, we outlined SSG/APAIT's adaptation of *Seeking Safety* to *HEAL*, which we posit is a transgender-centric model of intervention adaptation. This process consisted of multiple steps, building on existing adaptation frameworks, but also integrating the structural disadvantages experienced by transgender women of Color. This process of adaptation has been used in subsequent SSG/APAIT intervention design, and the results of this program have been used in the design of subsequent programs for transgender women of Color and other vulnerable populations (e.g., SSG/APAIT used preliminary results from *HEAL* for its subsequent adaptation of *Seeking Safety* for its most recent program, *Health Integration for At-risk Racial/ethnic Communities,* or *HIARC*).

For research question 2, the statistical results comparing baseline and three months after completion of *HEAL* indicated that there was significant decrease in reported alcohol use, depression, and severe anxiety. These results indicate that *HEAL* may have significant effects with respect to co-occurrence of substance use and mental health issues. A larger and randomized controlled study of *HEAL* would have more statistical power to enable examinations of mechanisms that explain these effects. For example, in a larger study we could test whether changes in internalized intersecting stigma was influenced by the intervention and was associated with decreases in alcohol use and depression and anxiety.

Other limitations of the study included the prevalence of missing data due to the voluntary nature of data collection. Missing data limited our ability to examine race, income and PTSD. In addition, because this group of transgender women of Color participants reported that illegal

substance use was not a large problem (in contrast to extant research) at baseline, there was little change that could be reported. This suggests that this group of transgender women of Color may be unique and not representative of the population in Los Angeles. This may be due to the recruitment strategy (the group consisted of referred individuals), so these results are not generalizable to transgender women of Color in Los Angeles or to transgender women more generally.

## Conclusion

Even with these limitations, the results suggest that transgender-centric translation approaches may lead to programs that significantly improve co-occurring substance use and mental health for transgender women of Color. The transgender-centric adaptation process, which included participation in program design by transgender women of Color both in the foundational data collection phase and in the program/workshop revision phase, suggests that having multiple feedback opportunities by the target population may result in an effective program adaptation. We recommend that organizations aiming to adapt existing programs include feedback from members of the communities that the adapted programs aim to help, and in addition, recruit and train community members to staff and deliver the programs.

The statistical results indicate that *HEAL*, a trauma-based program with a short program delivery timeline, may show longer term effects on substance use and mental health. This is similar to the existing literature, especially the RCT studies of *Seeking Safety* that show effects on particular substance use or mental health outcomes. However, given the severity of instability for these transgender women of Color, the lack of effects for other outcomes may indicate that structural obstacles to economic stability, such as lack of stable and affordable housing, play a role in the effects of *HEAL*. We recommend therefore that programs targeting substance use and mental health for transgender women of Color should be combined with services that directly address disadvantage (i.e., lack of access to housing, income/employment, health care). Indeed, as a consequence of this experience, SSG/APAIT has acquired a house near downtown Los Angeles to provide transitional bridge housing for sixteen transgender women of Color that will include programs such as *HEAL*.

This is a small group of participants ($N = 81$) and consisted of referred individuals. We recommend that future research examine (1) whether this transgender-centric adaptation process is effective in other programs aimed at transgender women of Color (i.e., process transfer), (2) whether *HEAL* is scalable and generalizable, and (3) whether program elements that address structural disadvantage (e.g., lack of affordable housing, un-/under-employment, lack of access to health care) are necessary for more significant program outcomes.

## Notes

1. After *HEAL* program funding ended, the adaptation sustained connection with program alumni by connecting them with existing substance use treatment, peer support, and other available services at SSG/APAIT.
2. The Government Performance and Results Act of 2010 requires that grantees collect approved program performance information (https://www.samhsa.gov/grants/gpra-measurement-tools/csat-gpra). The measures for anxiety, depression, and PTSD required by GPRA have been tested for validity and reliability (Conybeare et al., 2012; Fydrich et al., 1992; Garcia-Batista et al., 2018).

## Disclosure statement

Lois Takahashi is a member of SSG/APAIT's Charitable Board of Advisors, Jury Candelario is Director, SSG/APAIT, and Abigail Proff was Senior Program Manager, SSG/APAIT. Karin Tobin and Fang-Ying Li report no conflicts of interest.

All procedures performed in studies involving human participants were in accordance with the ethical standards of the institutional and/or national research committee and with the 1964 Helsinki declaration and its later amendments or comparable ethical standards. For this type of study formal consent is not required.

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## References


Amaro, H., Chernoff, M., Brown, V., Arévalo, S., & Gatz, M. (2007). Does integrated trauma-informed substance abuse treatment increase treatment retention? *Journal of Community Psychology*, *35*(7), 845–862. https://doi.org/10.1002/jcop.20185

Bockting, W. O., Robinson, B. E., & Rosser, B. R. S. (1998). Transgender HIV prevention: A qualitative needs assessment. *AIDS Care*, *10*(4), 505–525. https://doi.org/10.1080/09540129850124028

Boden, M. T., Kimerling, R., Jacobs-Lentz, J., Bowman, D., Weaver, C., Carney, D., Walser, R., & Trafton, J. A. (2012). Seeking Safety treatment for male veterans with a substance use disorder and post-traumatic stress disorder symptomatology. Addiction, *107*(3), 578–586. https://doi.org/10.1111/j.1360-0443.2011.03658.x

Bradford, J., Reisner, S. L., Honnold, J. A., & Xavier, J. (2013). Experiences of transgender-related discrimination and implications for health: results from the Virginia Transgender Health Initiative Study. *American Journal of Public Health*, *103*(10), 1820–1829. ; PMID: 23153142 https://doi.org/10.2105/AJPH.2012.300796

Burnes, T. R., Singh, A. A., Harper, A. J., Harper, B., Maxon-Kann, W., Pickering, D. L., & Hosea, J. U. L. I. A. (2010). American Counseling Association: Competencies for counseling with transgender clients. *Journal of LGBT Issues in Counseling*, *4*(3-4), 135–159. https://doi.org/10.1080/15538605.2010.524839

Castro, F. G., Barrera, M., Jr,., & Holleran Steiker, L. K. (2010). Issues and challenges in the design of culturally adapted evidence-based interventions. *Annual Review of Clinical Psychology*, *6*, 213–239. https://doi.org/10.1146/annurev-clinpsy-033109-132032

Conybeare, D., Behar, E., Solomon, A., Newman, M. G., & Borkovec, T. D. (2012). The PTSD Checklist-Civilian Version: reliability, validity, and factor structure in a nonclinical sample. *Journal of Clinical Psychology*, *68*(6), 699–713. https://doi.org/10.1002/jclp.21845

Fydrich, T., Dowdall, D., & Chambless, D. L. (1992). Reliability and validity of the Beck Anxiety Inventory. *Journal of Anxiety Disorders*, *6*(1), 55–61. https://doi.org/10.1016/0887-6185(92)90026-4

García-Batista, Z. E., Guerra-Peña, K., Cano-Vindel, A., Herrera-Martínez, S. X., & Medrano, L. A. (2018). Validity and reliability of the Beck Depression Inventory (BDI-II) in general and hospital population of Dominican Republic. *PloS One*, *13*(6), e0199750https://doi.org/10.1371/journal.pone.0199750

Gatz, M., Brown, V., Hennigan, K., Rechberger, E., O'Keefe, M., Rose, T., & Bjelajac, P. (2007). Effectiveness of an integrated, trauma-informed approach to treating women with co-occurring disorders and histories of trauma: The Los Angeles site experience. *Journal of Community Psychology*, *35*(7), 863–878. https://doi.org/10.1002/jcop.20186

Ginexi, E. M., & Hilton, T. F. (2006). What's next for translation research? Eval Health Prof, *29*(3), 334–347. https://doi.org/10.1177/0163278706290409

Glasgow, R. E., Lichtenstein, E., & Marcus, A. (2003). Why don't we see more translation of health promotion research to practice? Rethinking the efficacy-to-effectiveness transition. *American Journal of Public Health*, *93*(8), 1261–1267. PMID: 12893608 https://doi.org/10.2105/ajph.93.8.1261

Heng, A., Heal, C., Banks, J., & Preston, R. (2018). Transgender peoples' experiences and perspectives about general healthcare: A systematic review. *International Journal of Transgenderism*, *19*(4), 359–378. https://doi.org/10.1080/15532739.2018.1502711

Hien, D. A., Cohen, L. R., Miele, G. M., Litt, L. C., & Capstick, C. (2004). Promising treatments for women with comorbid PTSD and substance use disorders. *The American Journal of Psychiatry*, *161*(8), 1426–1432. https://doi.org/10.1176/appi.ajp.161.8.1426

Hien, D. A., Wells, E. A., Jiang, H., Suarez-Morales, L., Campbell, A. N. C., Cohen, L. R., Miele, G. M., Killeen, T., Brigham, G. S., Zhang, Y., Hansen, C., Hodgkins, C., Hatch-Maillette, M., Brown, C., Kulaga, A., Kristman-Valente, A., Chu, M., Sage, R., Robinson, J. A., Liu, D., & Nunes, E. V. (2009). Multisite randomized trial of behavioral interventions for women with co-occurring PTSD and substance use disorders. *Journal of Consulting and Clinical Psychology*, *77*(4), 607–619. https://doi.org/10.1037/a0016227

Hughes, T. L., & Eliason, M. (2002). Substance use and abuse in lesbian, gay, bisexual and transgender populations. *The Journal of Primary Prevention*, *22*(3), 263–298. https://doi.org/10.1023/A:1013669705086

Kenagy, G. P. (2005). Transgender health: Findings from two needs assessment studies in Philadelphia. *Health & Social Work*, *30*(1), 19–26. https://doi.org/10.1093/hsw/30.1.19

Kraft, J. M., Mezoff, J. S., Sogolow, E. D., Neumann, M. S., & Thomas, P. A. (2000). A technology transfer model for effective HIV/AIDS interventions: science and practice. *AIDS Education and Prevention : official Publication of the International Society for AIDS Education*, *12*(Suppl 5), 7–20.

Marsh, T. N., Cote-Meek, S., Young, N. L., Najavits, L. M., & Toulouse, P. (2016). Indigenous healing and seeking safety: A blended implementation project for intergenerational trauma and substance use disorders. *International Indigenous Policy Journal*, *7*(2). https://doi.org/10.18584/iipj.2016.7.2.3

McDevitt, J., Balboni, J., Garcia, L., & Gu, J. (2001). Consequences for victims: A comparison of bias-and

non-bias-motivated assaults. *American Behavioral Scientist*, *45*(4), 697–713. https://doi.org/10.1177/0002764201045004010

Najavits, L. (2002). *Seeking safety: A treatment manual for PTSD and substance abuse*. Guilford Publications.

Najavits, L. M., Gallop, R. J., & Weiss, R. D. (2006). Seeking safety therapy for adolescent girls with PTSD and substance use disorder: A randomized controlled trial. *The Journal of Behavioral Health Services & Research*, *33*(4), 453–463. https://doi.org/10.1007/s11414-006-9034-2

Najavits, L. M., Weiss, R. D., Shaw, S. R., & Muenz, L. R. (1998). Seeking safety": Outcome of a new cognitive-behavioral psychotherapy for women with posttraumatic stress disorder and substance dependence. *Journal of Traumatic Stress*, *11*(3), 437–456. https://doi.org/10.1023/A:1024496427434

Neumann, M. S., & Sogolow, E. D. (2000). Replicating effective programs: HIV/AIDS prevention technology transfer. *AIDS Education and Prevention: Official Publication of the International Society for AIDS Education*, *12*(Suppl 5), 35–48.

Norton, W. E., Amico, K. R., Cornman, D. H., Fisher, W., & Fisher, J. D. (2009). An agenda for advancing the science of implementation of evidence-based HIV prevention interventions . *AIDS and Behavior*, *13*(3), 424–429. https://doi.org/10.1007/s10461-009-9556-8

Poteat, T., German, D., & Kerrigan, D. (2013). Managing uncertainty: A grounded theory of stigma in transgender health care encounters. *Social Science & Medicine (1982))*, *84*, 22–29. https://doi.org/10.1016/j.socscimed.2013.02.019

Reback, C. J., Clark, K., Holloway, I. W., & Fletcher, J. B. (2018). Health disparities, risk behaviors and healthcare utilization among transgender women in Los Angeles County: A comparison from 1998-1999 to 2015-2016. *AIDS and Behavior*, *22*(8), 2524–2533. https://doi.org/10.1007/s10461-018-2165-7

Safer, J. D., Coleman, E., Feldman, J., Garofalo, R., Hembree, W., Radix, A., & Sevelius, J. (2016). Barriers to healthcare for transgender individuals. *Current Opinion in Endocrinology, Diabetes, and Obesity*, *23*(2), 168–171. https://doi.org/10.1097/MED.0000000000000227

Shipherd, J. C., Maguen, S., Skidmore, W. C., & Abramovitz, S. M. (2011). Potentially traumatic events in a transgender sample: frequency and associated symptoms. Traumatology, *17*(2), 56–67. https://doi.org/10.1177/1534765610395614

Solomon, J., Card, J. J., & Malow, R. M. (2006). Adapting efficacious interventions: Advancing translational research in HIV prevention. *Evaluation & the Health Professions*, *29*(2), 162–194. https://doi.org/10.1177/0163278706287344

Wingood, G. M., & DiClemente, R. J. (2008). The ADAPT-ITT model: a novel method of adapting evidence-based HIV interventions. *JAIDS Journal of Acquired Immune Deficiency Syndromes*, *47*(Supplement 1), S40–S46. https://doi.org/10.1097/QAI.0b013e3181605df1

Zlotnick, C., Najavits, L. M., Rohsenow, D. J., & Johnson, D. M. (2003). A cognitive-behavioral treatment for incarcerated women with substance abuse disorder and posttraumatic stress disorder: Findings from a pilot study. *Journal of Substance Abuse Treatment*, *25*(2), 99–105. https://doi.org/10.1016/S0740-5472(03)00106-5