Peer support in a crisis respite program:
Preliminary outcomes

Submitted to Texas Health and Human Services Commission (HHSC)
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Plain English Summary

In Fiscal Year 2015, the Texas Department of State Health Services (DSHS; now Texas Health and Human Services Commission [HHSC]) contracted with researchers at the Texas Institute for Excellence in Mental Health (TIEMH), University of Texas at Austin School of Social Work to conduct a pilot study of the recovery outcomes of people receiving peer-provided mental health services. The Peer Outcomes Pilot (POP) study initially focused its investigation within two Texas mental health provider organizations; a state hospital and a Local Mental Health Authority (LMHA) in the Austin area. A unique aspect of this study was the collaboration with peer support providers employed at the study sites in the conducting of research planning processes and study activities (e.g., study planning and design; outcome selection; instrument development; training in survey administration; and other data collection). This report focuses on research processes and results from the LMHA site, Bluebonnet Trails Community Services (BTCS). For more information about research processes and findings at the state hospital site, Austin State Hospital (ASH), see Kuhn, Chubinsky, Stevens-Manser, and Peterson (2017).

This study examined the recovery outcomes of people receiving peer support in a Crisis Respite services program. It also documented the process by which TIEMH researchers and peer support providers (PSPs) at the site collaborated to conduct the study. PSPs at the site of this study worked with TIEMH researchers to implement the study, including study planning and data collection. PSPs administered a self-report survey to 56 people receiving Crisis Respite services during the study time-frame. The survey was created in collaboration between PSPs and researchers to assess two domains identified by PSPs as integral to recovery-oriented care. Administrative data was also collected for 339 people receiving Crisis Respite services during the study time-frame. Additional measures examined included the Adult Needs and Strengths Uniform Assessment (ANSA), level of care, length of stay, and service use. This report describes the process by which TIEMH researchers and PSPs collaborated to complete the study, as well as preliminary findings regarding service outcomes.

Introduction

Recovery is “a process of change through which individuals improve their health and wellness, live a self-directed life and strive to reach their full potential” (Substance Abuse and Mental Health Services Administration [SAMHSA], 2015). The Surgeon General’s Report on Mental Health (U.S. Department of Health and Human Services [HHS], 1999) and the President’s New Freedom Commission on Mental Health (2003) named recovery the organizing principle for the transformation of mental health services and the expected outcome of mental health services.

Peer support specialists are people in recovery who are employed to share their experiences, in order to promote the recovery of others affected by mental illness. Little research exists to support the provision of peer support services to persons receiving mental health services. However, preliminary meta-analysis suggests that peer support services may influence certain recovery outcomes including: reduced inpatient service use, improved relationship with providers, better engagement with care, higher levels of empowerment, higher levels of patient activation, higher levels of hopefulness for recovery (Chinman, George, Dougherty, Daniels, Ghose, Swift, & Delphin-Rittmon, 2014), reduced length of stay, reduced crisis and emergency service use, improved social relations, and greater client satisfaction with service provision (Pitt et al., 2013).
Recent studies suggest that peer support may influence these outcomes by assisting in the creation of recovery plans, providing group peer support (Chinman et al., 2015), assisting with Wellness Recovery Action Planning (WRAP; Jonikas et al., 2013), providing one-to-one peer support (Mahlke et al., 2017; Rogers et al., 2016), and providing independent living skills training (Salzer et al., 2016).

**Collaborators in the research process**

Involving people with lived experience in research to ensure that experiential knowledge informs the fundamental structure of investigations into the field of mental health recovery (e.g., study design, survey design, data collection processes and techniques, interpreting findings, etc.) is rooted in empiricism: The tenet that knowledge comes primarily from sensory experience and that research hypotheses must be tested against these direct observations rather than relying on reasoning or intuition (Cozby, 2009).

Moderate evidence supports the effectiveness of employing service recipients to conduct mental health research. Specifically, it has been found that their involvement results in more valid and reliable instruments and findings (Oades, Law, & Marshall, 2011), improved accessibility of research documents (Nilsen, Myrhaug, Johansen, Oliver, & Oxman, 2013), and more relevant research priorities (Ghisoni et al., 2017; see also Hancock et al., 2012; Linhorst & Eckert, 2002; Rogers, Chamberlin, Ellison, & Crean, 1997; Staley, Kabir, & Szmukler, 2013). Collaboration between researchers and people with lived experience may result in a variety of additional benefits, including: improving consent procedures and enhancing recruitment rates (Ali et al., 2006; Staley, 2009), eliciting more candid interview responses (Williamson et al., 2010), modifying researcher misinterpretation in analyses (Savage et al., 2006), highlighting findings most relevant to service users (Ross et al., 2005), questioning interpretation and modifying how findings are reported (Faulkner, 2006; Rose, 2004), enhancing power and credibility of findings during dissemination (Smith et al., 2008), facilitating wider and more accessible dissemination (Barnard et al., 2005; McLaughlin, 2006), empowerment and strengthening of the voice of people in recovery (Beresford, 2002; Macaulay et al., 1999), increased knowledge, skills, and confidence of people in recovery (Rhodes et al., 2002), and deepening researchers’ understanding of the issues people in recovery face (Hewlett et al., 2006; Lindenmeyer et al., 2007).

**Rationale and Purpose**

This study of the Bluebonnet Trails Community Services (BTCS) Crisis Respite program outcomes is a response to the need for a greater evidence base for the effectiveness of peer-provided services on the recovery outcomes of people receiving mental health services. Further, based on the existing literature and state of the evidence, the authors of this report recognized the need for additional research that includes people in recovery in the research process. The purpose of this report is 1) to describe the methods and preliminary findings of this study in attempt to address the question of whether peer support positively impacts recovery outcomes following a person’s stay at BTCS Crisis Respite, 2) to provide recommendations for future studies of the outcomes of peer-provided services, and 3) to describe the process of collaborating with people with lived experience in the research process of this study.
Methods

The University of Texas at Austin Institutional Review Board (IRB) and the Department of State Health Services (DSHS; now HHSC) #2 IRB determined this study to be exempt from IRB oversight. All members of the research team had appropriate training in Human Subjects Research and the handling of sensitive information.

Study Planning

In Fiscal Year 2015, a pre-study planning meeting was conducted with program staff from DSHS, Via Hope (the certifying body of Certified Peer Specialists in Texas), and the Texas Council of Community Centers Director of Recovery Based Services. Representatives of these organizations are subject matter experts on documentation and billing of peer support services. The purpose of the meeting was to discuss barriers, identified by TIEMH researchers, to collecting peer services data (for the POP study). Specifically, these included barriers related to accuracy, completeness, and coding of peer services by LMHA. This meeting also served to address issues affecting peer services billing by LMHAs, including inconsistencies in documentation.

During the pre-study meeting, it was established that DSHS was unable to address data coding problems for the foreseeable future. Thus, it was determined that it would be best to work with LMHAs and State Hospitals, independently, to conduct outcome studies. To do so, researchers at TIEMH would need to identify organizations with well-established peer programs that bill and code for peer services provided.

Toward these goals, pre-planning and data collection phone calls were conducted with two potential candidate LMHAs to determine their interest in participating, and to clarify details of the peer services they provide: Austin Travis County Integral Care and BTCS. Based on the interviews, an invitation to participate in the study was extended to BTCS, an LMHA serving eight counties in Central Texas.

Prior to data collection, five planning meetings were conducted (January - September 2016) with researchers, Peer Support Provider (PSP) collaborators, and BTCS and DSHS program staff in order to finalize details of the study design (see Appendix A for a timeline of study activities). Additionally, communication and meetings were ongoing between researchers and BTCS staff over the course of the project, after data collection began, to ensure that data collection targets were met and that any questions or concerns that arose from collaborators and stakeholders were addressed in a timely manner.

Peer Provider Collaborators

The peer support provider (PSP) who collaborated with the TIEMH research team to implement the study was a full-time BTCS employee and had the support of supervisors to collaborate in this process. The PSP participated in the following aspects of the research process: collaborated with researchers on study design and planning; data collection and procedures to protect confidentiality; survey testing and feedback; and was trained by researchers in survey administration. The PSP administered the surveys, but due to the peer provider’s full-time employment and restrictions on external contract work, was not able to receive payment for survey administration.
Design

Design and planning meetings between researchers, PSP collaborators, and organizational and DSHS stakeholders were conducted between January and September of 2016 to finalize details of the study design before data collection began (see Appendix A for a timeline of study activities). Additionally, communications were ongoing over the course of the project after data collection began to ensure that targets were being met and that any questions or concerns that arose from collaborators and stakeholders were addressed in a timely manner.

The study design was cross-sectional in nature, with survey data collected from participants during the course of their stay at the BTCS Crisis Respite Center and administrative records data collected from a time period ranging from six months prior to admission to the Crisis Respite and three months post discharge from Crisis Respite1. Admissions to the Crisis Respite program were rolling, and dates of stay varied among participants, but ranged within the data collection time period from September 2016 to December 2016. The total data collection time period ranged from March 2016 to March 2017.

Setting

The BTCS peer-led Crisis Respite program is housed in the San Gabriel Crisis Center. A voluntary, 24/7, 14-bed outpatient unit available to individuals experiencing crisis, but who are not at risk of harm to self or others. Only adults who are non-violent and are not sex offenders are accepted in the unit; most patients are residents of Williamson County. The primary objective of the program is to stabilize and resolve a crisis situation in the community and to prevent more intensive hospitalization or criminal justice involvement. The anticipated length of stay for most admissions is 1 to 10 days, and BTCS bills Medicaid and private insurance for any rehabilitation or linkage services provided to persons who have these benefits. Services may include psychiatric assessments and evaluations, medication management including telemedicine services, counseling, group skills training and rehabilitation, and substance use counseling and support. Peer provided services at BTCS Crisis Respite are described in more detail on page 10.

Measures

The measures included a survey instrument that was developed for the study (See Appendix B) and several measures that existed in the electronic administrative data systems used by BTCS and batched to HHSC, including: the Adult Needs and Strengths Uniform Assessment (ANSA), level of care, length of stay, and service use.

Survey

The survey was developed in collaboration between researchers and PSPs at ASH through a series of meetings with peer providers, and was reviewed and approved for use in the Respite Center study by BTCS peer providers and supervisors. In the first meeting, peers identified constructs they believed should be 1) present in recovery-oriented care interactions and 2) promoted by peer providers in individual recovery. These included empathy, engagement, rapport/alliance/relationship, empowerment, self-direction, non-judgment, hope, and talents (strengths). Researchers first developed a bank of items from existing validated instruments that represented the intended outcomes of both peer services and recovery-oriented services (Herth, 1992; Oades, et al., 2011; Poulin

1 Data collection for this study is ongoing. In FY 2018, an additional dataset containing six months of post-Respite discharge data for the entire sample will be collected. This will extend the data collection time period to June 2017.
& Young, 1997; Rogers, Chamberlin, Ellison & Crean, 1997; Schrank, et al., 2012; Institute of Behavioral Research: Texas Christian University, 2005). The item bank was shared with the PSPs and an iterative process of review and revision was used to develop a final list. A meeting was then held to finalize the number of survey items and the item language. Researchers and PSPs shared the goal of creating a brief (i.e., about 10-15 items in length) instrument, which would have greater utility than a longer instrument (i.e., 30+ items) in a clinical setting and encourage greater response rates. The drafted survey was then pilot tested with individuals receiving services at both study sites. Feedback from this pilot testing of the instrument was used to make final changes to the instrument before it was administered to participants. The final version consisted of 16 items representing two domains: 1) Perception of recovery-oriented services received and 2) Perception of individual recovery status.

After the survey was developed and finalized, researchers conducted a brief training in survey administration for the PSP collaborating on the study. The training also served the purpose of providing an opportunity for the PSP collaborator to ask questions or address concerns regarding the specifics of administration specifically and the study purpose in general.

**ANSNA Uniform Assessment**

The ANSA (DSHS, 2016) is a multi-purpose assessment tool, with established reliability and validity. It was developed to assist clinicians in planning treatment for individuals, assigning a level of care, and to be used for quality improvement and monitoring of client outcomes in services. The assessment was also developed to connect the assessment process and the creation of individualized service plans. The basic structure of the ANSA includes 61 items across nine domains: Risk Behaviors (8 items), Behavioral Health Needs (12 items), Life Domain Functioning (15 items), Family/Caregiver Strengths and Needs (6 items), Strengths (12 items), Culture (4 items), Psychiatric Hospitalizations (3 items), Crisis History (1 item; see Appendix C). The ANSA also includes Extension Modules associated with nine of the items; scores on particular ANSA items indicate that corresponding extension modules (e.g. trauma) should be completed. Generally, items are scored on a scale from 0 to 3, with a higher number indicating greater need. A score of 0 or 1 on an item indicates a ‘strength’ that can be used for strengths-based planning while a score of 2 or 3 indicates a ‘need’ that should be addressed in the individual’s care plan. Item scores suggest different action levels of service-planning, which differ based on whether the item construct is a strength or a need for an individual:

<table>
<thead>
<tr>
<th>Item Score</th>
<th>Needs: Action</th>
<th>Strengths: Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>No evidence</td>
<td>Centerpiece strength</td>
</tr>
<tr>
<td>1</td>
<td>Watchful waiting/prevention</td>
<td>Strength that you can use in planning</td>
</tr>
<tr>
<td>2</td>
<td>Action</td>
<td>Strength has been identified-must be built</td>
</tr>
<tr>
<td>3</td>
<td>Immediate/Intensive Action</td>
<td>No strength identified</td>
</tr>
</tbody>
</table>

The ANSA can be used to measure outcomes by monitoring the change over time of individuals whose scores of 2 or 3 (needs) changed to scores of 0 or 1 (resolved need, built strength; Lyons & Walton, 2013). Nine ANSA items across two domains were selected for analysis based on their theoretical relationship to peer support and the evidence base for which aspects of recovery may be affected by peer support (Pitt et al., 2013; Chinman et al., 2014).
Level of Care

The Level of Care Recommended (LOC-R) for any service recipient of a Texas LMHA is established by the ANSA uniform assessment. Guidelines for service-use are outlined in the *Utilization Management (UM) Guidelines*, through which the Level of Care Authorized (LOC-A) is determined. The purpose of the LOC and the UM Guidelines are to ensure efficient, cost-effective utilization of limited service resources while achieving the best possible results for individuals. Together, the LOC-A and UM Guidelines assist clinicians in determining the best course of treatment for individuals, tailored to their needs and strengths. A LOC-A may deviate from a LOC-R when certain circumstances and/or clinical judgment indicate than an individual actually requires a greater or lesser level of care than recommended (HHSC, 2017).

Level of Care categories are outlined below:

- Level Of Care 0: Crisis Services
- Level Of Care 1M (Medication Management): Basic Services
- Level Of Care 1S (Skills Training): Basic Services
- Level Of Care 2: Basic Services including Counseling
- Level Of Care 3: Intensive TRR Services with Team Approach
- Level Of Care 4: Assertive Community Treatment (ACT)
- Level Of Care 5: Transitional Services
- Level Of Care EO: Early Onset (LOC-EO)
- Level Of Care TAY: Transition Age Youth (LOC-TAY)
- Level Of Care 6: Individual Refuses Services
- Level of Care 8: Waiting for all Authorized Services
- Level of Care 9: Not Eligible for Services

Length of Stay

Length of Stay was calculated as the difference in days between Crisis Respite admission and Crisis Respite discharge dates. A longer Length of Stay represents prolonged acuity and is more costly in terms of loss of time spent in the community and state revenue.

Service Use

Service use was measured by service codes reported to the HHSC administrative records system. The researchers acknowledge that some services may be provided to individuals, but not billed to Medicaid, and are thus left unreported.

**Peer Support Services at BTCS Crisis Respite**

At BTCS, “peer support services are recovery focused, person centered services for people who are living with mental health concerns. [...] Peer services can be provided in an individual or a group setting and are designed to ignite hope, foster independence, and promote personal growth” (BTCS, 2016).
Peer provided services offered in the Crisis Respite unit include:

- **Recovery Dialogues** - Recovery Dialogues are designed to help a person achieve awareness and increase her or his self-confidence. People are encouraged to identify and reflect on those times in their lives when they were able to act on their own behalf and affect their lives in a positive manner.

- **Wellness Recovery Action Planning (WRAP)** – This program is a structured system for monitoring uncomfortable and distressing feelings and behaviors and, through planned responses, reducing, modifying or eliminating them. SAMHSA has identified WRAP as an evidence-based best practice. Participants will receive a certificate upon completion of 18 hours of WRAP facilitation.

- **Whole Health and Resiliency** – This curriculum-based program has been developed following the guidelines established by the chronic disease self-management program (CDSMP) from Stanford University. This activity incorporates self-management and peer-support strategies to foster recovery in body, mind and spirit. Participants formulate goals and weekly action strategies to improve their healthy lifestyle across ten domains of wellness including healthy eating, physical activity, restful sleep, stress management, service to others, support network, optimism based on positive expectations, cognitive skills to avoid negative thinking, spiritual beliefs and practices, and a sense of meaning and purpose.

- **Dual Recovery** – This support group allows person with hurts, habits, and hang-ups to share their experiences in overcoming their difficulties. A simple rational emotive behavior strategy is introduced to help persons evaluate their thinking to help avoid poor choices and relapse.

  (B. Gilstrap, personal communication, June 13, 2016)

**Participants**

Inclusion criteria for participants required that they be adults (aged 18 or over), English-speaking, currently receiving services (residing) in the BTCS Crisis Respite Unit. The PSP administering surveys used a convenience sampling technique, where (voluntary) surveys were administered during peer support group sessions.

**Analysis**

All data was analyzed using SPSS version 24 by members of the research team. Analysis of descriptive statistics and paired sample t-test were conducted.

**Results**

Administrative data was collected for a total of 339 individuals. Those individuals who had not been receiving LMHA services for at least 90 days prior to their admission to Crisis Respite and at least 90 days post discharge from Crisis Respite were excluded from analysis, leaving a total sample of \( n = 85 \). This selection was necessary to ensure consistency within the sample, such that all individuals had uniform opportunity to receive services. While survey data was received for \( n = 56 \), after excluding those who had not received services for 90 days pre- and 90 days post-Crisis Respite, \( n = 24 \) remained who had survey data (28% of the total sample).
Demographics

Analysis of demographic information indicated that participant mean age was 38 years ($SD = 14$), with a minimum age of 18 and a maximum age of 65. Race, ethnicity, and sex are detailed in Table 1 below.

Table 1. Demographic variables ($n = 85$)

<table>
<thead>
<tr>
<th>Variable</th>
<th>$N$</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Race</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Asian or Pacific Islander</td>
<td>1</td>
<td>1.2</td>
</tr>
<tr>
<td>Black</td>
<td>9</td>
<td>10.6</td>
</tr>
<tr>
<td>More than one race</td>
<td>13</td>
<td>15.3</td>
</tr>
<tr>
<td>White</td>
<td>62</td>
<td>72.9</td>
</tr>
<tr>
<td>Ethnicity</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hispanic or Latino</td>
<td>20</td>
<td>23.5</td>
</tr>
<tr>
<td>Not Hispanic or Latino</td>
<td>65</td>
<td>76.5</td>
</tr>
<tr>
<td>Sex</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>38</td>
<td>44.7</td>
</tr>
<tr>
<td>Male</td>
<td>47</td>
<td>55.3</td>
</tr>
</tbody>
</table>

Survey

For the retained sample ($n = 85$) who met the requirement of time in services at least 90 days before and 90 days after Crisis Respite stay, $n = 23$ of 24 had completed survey data ($\geq 75\%$ of items complete). The survey consisted of 16 items representing two domains: 1) Perception of recovery-oriented services received (at BTCS) and 2) individual recovery status. See Table 2 for scores in both survey domains.

Table 2. Survey domain scores ($n = 23$)

<table>
<thead>
<tr>
<th>Survey domain</th>
<th>Mean (SD)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Recovery-oriented services (8 items)</td>
<td>4.2 (.58)</td>
</tr>
<tr>
<td>Individual recovery (8 items)</td>
<td>3.9 (.56)</td>
</tr>
</tbody>
</table>

Outcomes: Length of Stay, Level of Care, Service Use, and ANSA items

Length of Stay

The Crisis Respite stay that was selected for analysis occurred during the survey administration time frame (September to December 2016). Length of stay was calculated from the date of Crisis Respite admission to the date of Crisis Respite discharge (in 10 cases, these occurred on the same day, which was coded as ‘0’ days). Length of stay ranged from 0 to 61 days, with a median of four days.
Level of Care

The LOC-A assigned in the date range approximately 90 days prior to Crisis Respite admission and approximately 90 days post Crisis Respite discharge were captured. Data was missing for a majority (75.3%) of the sample because most individuals had not had LOC assessed within these time frames. Most individuals for whom LOC-A was assessed in these time periods (81%; 17) showed no change in LOC-A between pre and post, and the same number moved to a less intensive LOC (9.5%; 2) as moved to a more intensive LOC (9.5%; 2).

Service Use

The service codes which appeared most frequently across the data date range represented Crisis Intervention Rehabilitation Services, Diagnostic Eligibility, Medication Related Services, Routine Case Management, Psychosocial Rehabilitation, Crisis Respite Services, and Extended Observation.

Service use during Crisis Respite ranged from 0 to 107 service codes reported ($M = 11.0$, $SD = 14.17$) between Crisis Respite admission and Crisis Respite discharge. The total number of service codes reported for individuals within the 90-day period prior to Crisis Respite admission ranged from 0 to 93 ($M = 23.5$, $SD = 20.3$), whereas the total number of codes reported within the 90-day period post-Crisis Respite discharge ranged from 0 to 92 ($M = 19.8$, $SD = 18.0$). The difference between services pre- and post-crisis was normally distributed as assessed by the Shapiro-Wilk test ($p < .05$). There were five outliers, however they were determined to not influence the overall test and were therefore included in the analysis. A paired sample t-test indicated that the decrease in service use was not statistically significant from pre-Crisis to post-Crisis ($MD (SD) = 3.75 (24.47)$, $t (df) = 1.41 (84)$, $p = .16$).

ANSA Items

A descriptive analysis of changes in ANSA item scores from Time 1 (90 - 180 days pre respite) to Time 2 (90 - 180 days post respite) revealed that the items demonstrating the most improved scores (changing from a need to a strength) were Optimism, Resiliency, Community Connection, and Natural Supports, while the items with scores demonstrating increasing need post-Crisis Respite included Social Functioning, Recreational Functioning, and Social Connectedness.

See Table 3 for a summary of status change for each item. Table 3 is organized according to the following change categories:

<table>
<thead>
<tr>
<th>Change category</th>
<th>Definition of category</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strength → Need</td>
<td>ANSA score changed from 0 or 1 pre-Respite to 2 or 3 post-Respite</td>
</tr>
<tr>
<td>Need → Remained</td>
<td>ANSA score was 2 or 3 pre-Respite and remained 2 or 3 post-Respite</td>
</tr>
<tr>
<td>Strength → Improved</td>
<td>ANSA score was 0 or 1 pre-Respite and remained 0 or 1 post-Respite. Most individuals that fell into this category had improved scores, in other words, changed from 1 to 0.</td>
</tr>
<tr>
<td>Need → Strength</td>
<td>ANSA score changed from 2 or 3 pre-Respite to 0 or 1 post-Respite</td>
</tr>
</tbody>
</table>
Table 3. ANSA item scores: Status change from Pre-Crisis to Post-Crisis (n = 41)

<table>
<thead>
<tr>
<th>ANSA Domain</th>
<th>ANSA Item</th>
<th>Strength → Need</th>
<th>Need → Remained</th>
<th>Strength → Improved</th>
<th>Need → Strength</th>
</tr>
</thead>
<tbody>
<tr>
<td>Life Domain Functioning</td>
<td>Physical/medical</td>
<td>4.9% (2)</td>
<td>7.3% (3)</td>
<td>80.5% (33)</td>
<td>7.3% (3)</td>
</tr>
<tr>
<td></td>
<td><em>This rating includes both health problems and chronic/acute physical conditions.</em></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Life Domain Functioning</td>
<td>Social functioning</td>
<td>24.4% (10)</td>
<td>17.1% (7)</td>
<td>41.5% (17)</td>
<td>17.1% (7)</td>
</tr>
<tr>
<td></td>
<td><em>This item refers to the individual’s current status in getting along with others in his/her life.</em></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Life Domain Functioning</td>
<td>Recreational</td>
<td>24.4% (10)</td>
<td>17.1% (7)</td>
<td>48.8% (20)</td>
<td>9.8% (4)</td>
</tr>
<tr>
<td></td>
<td><em>This item is intended to reflect the individual’s access to and use of leisure time activities.</em></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Life Domain Functioning</td>
<td>Involvement in recovery</td>
<td>9.8% (4)</td>
<td>12.2% (5)</td>
<td>70.7% (29)</td>
<td>7.3% (3)</td>
</tr>
<tr>
<td></td>
<td><em>This rating focuses on the level of the individual’s active participation in treatment and self-management of behavioral health needs.</em></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Strengths</td>
<td>Social connectedness</td>
<td>17.1% (7)</td>
<td>43.9% (18)</td>
<td>26.8% (11)</td>
<td>12.2% (5)</td>
</tr>
<tr>
<td></td>
<td><em>This item is used to refer to the interpersonal skills of the individual as they relate to others.</em></td>
<td></td>
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</tr>
<tr>
<td>Strengths</td>
<td>Optimism</td>
<td>12.2% (5)</td>
<td>36.6% (15)</td>
<td>26.8% (11)</td>
<td>24.4% (10)</td>
</tr>
<tr>
<td></td>
<td><em>This rating should be based on the individual’s sense of his/her own future. This is intended to rate the individual’s positive future orientation.</em></td>
<td></td>
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</tr>
<tr>
<td>Strengths</td>
<td>Community connection</td>
<td>12.2% (5)</td>
<td>56.1% (23)</td>
<td>14.6% (6)</td>
<td>17.1% (7)</td>
</tr>
<tr>
<td></td>
<td><em>This rating should be based on the individual’s level of involvement in the cultural aspects of life in his/her community.</em></td>
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</tr>
<tr>
<td>Strengths</td>
<td>Natural supports</td>
<td>12.2% (5)</td>
<td>53.7% (22)</td>
<td>19.5% (8)</td>
<td>14.6% (6)</td>
</tr>
<tr>
<td></td>
<td><em>This rating refers to unpaid individuals other than family members.</em></td>
<td></td>
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<tr>
<td>Strengths</td>
<td>Resiliency</td>
<td>9.8% (4)</td>
<td>39.0% (16)</td>
<td>29.3% (12)</td>
<td>22.0% (9)</td>
</tr>
<tr>
<td></td>
<td><em>This rating should be based on the individual’s ability to identify and use strengths in managing their lives.</em></td>
<td></td>
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</tbody>
</table>
Discussion

Conclusions

The foremost conclusion of this pilot study is that the codes that BTCS implements to capture peer service provision (in Anasazi) does not translate to the HHSC records system (Clinical Management for Behavioral Health Services; CMBHS). This limits the ability to describe the frequency and/or type of peer service utilization, or to conduct analysis of differences between groups. This finding is the primary limitation of this study (see Limitations).

While it is clear that service utilization decreased from before to after Crisis Respite stay, the difference is not statistically significant, which limits the ability to conclude that the difference would be replicated in other samples. One reason for this lack of statistical significance could be the small sample size. Fortunately, the sample size will increase in Fiscal Year (FY) 2018, as more data is collected. If service utilization does emerge as a variable that decreases significantly over time, this could indicate decreasing acuity and decreasing overall cost of providing services to individuals who have stayed in Crisis Respite. Ultimately a comparison would need to be made between individuals who have received Crisis Respite services and those who have not to determine whether that decrease, if real, represents an improvement over treatment as usual or hospitalization to resolve crisis situations.

Another clear difference was seen in changes in ANSA item scores from before Crisis Respite stay to after. However, the structure of ANSA item scores and the way that changes are analyzed over time limit the ability to conduct inferential statistical tests on these changes, so differences must be presented descriptively. With additional time points, deeper analysis could be conducted. The most apparent improvements (Optimism, Community Connections, Natural Supports, and Resiliency) were closely linked to both the stated purpose of the BTCS Crisis Respite program (ignite hope, foster independence, and promote personal growth) and the intended outcomes of some of the specific peer support services provided at Crisis Respite (Recovery Dialogues: increase self-confidence; WHR: improve across ten domains of wellness including healthy eating, physical activity, restful sleep, stress management, service to others, support network, optimism based on positive expectations, cognitive skills to avoid negative thinking, spiritual beliefs and practices, and a sense of meaning and purpose). Other improvements were indicated by the data. For example, many individuals changed from a score of 1 at pre-Respite to 0 at post-Respite, indicating a meaningful improvement, however, these differences are not visible through analysis based on the Strength to Need / Need to Strength constructs developed by ANSA authors.

Limitations

Current Study

Data collection and analysis of this study site is ongoing. Inconsistencies between the billing and service codes used by BTCS and by HHSC obscure information about which services were specifically provided by peer support providers and/or were peer support services in and of themselves. BTCS reports information about peer services, but the codes do not appear to be matched in the HHSC data system. Consequently, while the Crisis Respite
program is peer-led, researchers do not yet have information about the frequency or type of peer services received by clients. The lack of a peer support service code at the state level compounds this issue of loss of specificity of information between LMHA and HHSC data systems.

The study design was cross-sectional in nature; it only examined data for a specific time period (6 to 12 months). A longitudinal study that follows individual outcomes over a long period of time would be needed to make future studies more robust. Additionally, the small sample size may result in a diminished ability to detect statistically significant differences for the sample over time. The sample size will increase as more administrative data is collected in FY2018.

In any survey that relies on self-report, response biases, including acquiescence, social desirability, and demand characteristics, may confound results. These might have affected participants’ responses to survey items related to the recovery orientation of services received and their reported perception of individual recovery.

Limitations of involving peer support providers in research activities

One limitation of collaborating with peer support providers in research of this type is that the availability of a collaborator is based on his or her job role and duties. In this pilot study, the PSP collaborator’s ability to continue survey data collection past a certain point was limited due to changing circumstances in job role and location at BTCS.

Other limitations or challenges to PSPs collaborating in the research process include environmental and time constraints (e.g., administering surveys on a busy unit or research duties taking time away from being with people in a peer support capacity) and conflict between the “research” role and the “peer” role. See a detailed discussion of challenges and limitations in the Peers in Research (PIR) study report (Kuhn, Lodge, & Stevens Manser, 2017).

Recommendations

Recommendations for peer outcomes studies

- With the passage of House Bill (H.B.) 1486 in the Texas legislature in 2017, rules will need to be adopted which both define the scope of peer services and distinguish them from other services that peer specialists may provide. The findings and conclusions presented by this study, and the data needs indicated by those, should inform the development of those rules and the reporting of peer services over the coming Fiscal Years 2018-19.
- Eliminating reliance on survey data/respondents would increase accessibility to a larger sample size as data would all be extracted from existing records.
- Obtaining an IRB determination earlier on in the process, before design details are fully formed, in order to obtain sample data during planning phases of research, would allow preliminary investigation of what data ‘looks like’ and would allow more specific, data-driven data collection and analysis planning.
- Until peer services data is being accurately and consistently reflected by statewide coding criteria, opening discussions with the study site organizations during the planning phase to pull data directly from
their electronic record systems as opposed to obtaining it after it has been filtered through HHSC may overcome some of the challenges associated with the loss of data specificity about peer services.

**Recommendations for studies involving PIR in research designs**

The following recommendations were made, to improve collaborations between researchers and collaborators:

- The task of collaborating in the research process should not necessarily be made available to anyone who would be willing, but rather a few, key collaborators should be identified on the front-end to increase investment and clarify job roles and expectations. This would also allow for more consistent, formal check-ins, technical assistance, and follow through over the course of the study.
- The possibility of initiating closed-end contracts with collaborators should be explored, so that the scope of work to be contributed is detailed on the front-end, increasing commitment to the study and allowing more accurate planning (e.g., for sample size) in the design phase.

For additional recommendations, see the PIR study report (Kuhn et al., 2017).
References


Appendix A: Timeline of Study Activities

Peer Outcomes Pilot Study Timeline of Activities
FY 2015 – FY 2017

Preparation: 1/1/2015 - 12/31/2015
Planning & Development: 1/7/2016 - 9/1/2017
Data Collection: 9/1/2016 - 5/31/2017
Analysis & Reporting: 5/1/2017 - 8/31/2017
Ongoing Study Development: 9/1/2016 - 8/31/2017

Project Begin: 9/1/2014
Pre-planning with HHSC: 1/12/2015
Planning & Development Meetings Kickoff with Sites: 1/7/2016
IRB Approval: 7/17/2016
Surveys Administration Begins: 9/9/2016
Administrative Data Collection Begins: 4/17/2017
Ongoing Study Development: Peers in Research Focus Group: 5/24/2017
Appendix B: Survey Items

**Recovery Services Survey**

We would like to know about your time spent at Bluebonnet Trails Community Services (BTCS). We want to know how staff treated you, how you see yourself, and how you liked or disliked the services you have received. Your responses will be private and used to make other peoples’ time here better.

Thinking about the BTCS staff who you interact with, please rate how frequently the following occurs:

<table>
<thead>
<tr>
<th>Item</th>
<th>Never</th>
<th>Rarely</th>
<th>Sometimes</th>
<th>Often</th>
<th>Always</th>
</tr>
</thead>
<tbody>
<tr>
<td>Talking with staff gives me hope.</td>
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<tr>
<td>Staff help me think about what I want for my life.</td>
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<tr>
<td>Talking with staff helps me believe in myself.</td>
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<td>Staff encourage me to participate in my treatment.</td>
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<tr>
<td>Staff include me in decisions made about me and my treatment.</td>
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<tr>
<td>Staff are easy to talk to.</td>
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<td>Staff are sensitive to my situation and my history.</td>
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<tr>
<td>Staff respect me and my beliefs.</td>
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Thinking about yourself, please rate the frequency with which you believe the following:

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<thead>
<tr>
<th>Item</th>
<th>Never</th>
<th>Rarely</th>
<th>Sometimes</th>
<th>Often</th>
<th>Always</th>
</tr>
</thead>
<tbody>
<tr>
<td>I am a capable person.</td>
<td></td>
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<tr>
<td>I have a right to make my own decisions, even if others do not agree.</td>
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<td>By working with others, I can help change my community.</td>
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<td>I am able to influence what happens in my life.</td>
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<td>I have inner strength.</td>
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<tr>
<td>My past experiences have prepared me for my future.</td>
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<tr>
<td>I believe that each day has potential.</td>
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<tr>
<td>I feel that my life has value.</td>
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**Appendix C: ANSA Form**

![ANSA Form](image-url)

**Note:** Shaded ratings on page 1 trigger required corresponding Extension Modules on page 2.