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CARE TRANSITIONS SUPPORT SERVICES

Outcomes and lessons learned through implementation of short-term transition support for clients discharged from psychiatric hospitalizations

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INTRODUCTION

From October 2015 to September 2019, the National Council for Behavioral Health, in partnership with Montefiore Medical Center, Northwell Health, the New York State Office of Mental Health (NYSOMH) and Netsmart Technologies, operated the Care Transitions Network for People with Serious Mental Illness (CTN). This four-year program provided training and technical supports to behavioral health providers across New York state (NYS) with the goals of reducing all cause rehospitalization rates for people with serious mental illness (SMI) and helping providers prepare for the transition to value-based payment arrangements.

Understanding the many barriers to successful client transitions of care post-hospitalization, CTN offered a pilot program to enrolled inpatient units, referred to as Care Transitions Support Services (CTSS). CTSS provided short-term, telephonic support and transition assessment interviews for clients discharged from a psychiatric hospitalization with the goals of ensuring the clients achieved mental health specialty outpatient visits within seven days or 30-days post-discharge and reducing 30-day mental health and all-cause readmissions.

The CTSS program actively engaged 4,941 transition episodes, resulting in an average 7-day follow-up of 54% and average 30-day follow-up of 64%. Cost and utilization analysis of CTSS clients identified $14,264,292 in total savings and marked increased in outpatient engagement and utilization, in addition to decreases in hospitalization. This paper will review the approaches, key findings, lessons learned, and recommendations based on the CTSS program and experiences.

BACKGROUND: REALITIES AND IMPACT OF MENTAL HEALTH HOSPITALIZATIONS AND CARE TRANSITIONS

As the health care system increasingly emphasizes improving client outcomes and lowering costs, reducing hospitalizations and readmissions are consistent areas of focus. In recent years, hospitalizations for mental health and substance use disorders increased at a faster rate than any other type of hospitalization.[3,4] A study released by the Agency for Healthcare Research and Quality in 2015 found that one-third of all non-maternal/neonatal inpatient stays included at least one mental health or substance use related diagnosis, with the most common diagnoses being SMIs such as mood disorders and schizophrenia.[2]

Research has found that clients with SMI are anywhere from 46 to 200 percent more likely to experience readmissions within 30 days of discharge and that up to half of all clients discharged from a psychiatric hospitalization end up being readmitted within a year.[8,11,16] Although there are many potential causes of readmissions — including failure to adequately stabilize clients before release, insufficient medication coordination and management, and inadequate communication between hospital staff, clients, caregivers and community-based services — they all tie to insufficient planning and poor execution of coordinated transitions of care. High prevalence of comorbidities and social determinant needs among people with SMI underscore the risk of potential readmission and need for coordination of care. However, fewer than half of discharged clients are connected to outpatient care within seven days.[16]

For the health system, poor coordination of care during transitions negatively impacts expenditures as well as health outcomes. Psychiatric hospitalization is the single greatest direct cost of SMI. In 2013, hospitalization for people with schizophrenia alone cost the United States $11.5 billion; $646 million of that amount resulted from readmission within 30 days of discharge.[7]

ADDRESSING READMISSION IN NEW YORK STATE

Through its Medicaid Redesign Team Waiver Amendment, NYS established the Delivery System Reform Incentive Payment (DSRIP) program with the primary goal of reducing avoidable hospital use by 25% over five years. According to the NYSOMH, 82% of patients with hospital readmissions are patients with mental health or substance use disorders. In New York City, the readmission rate for inpatient mental health services among unmanaged Medicaid patients is extremely high: 24% within 30 days and 36% within 90 days. This high mental health readmission rate is directly tied to missed outpatient mental health appointments after hospital discharge: only 27% of appointments within seven days of discharge were kept and 37% of those within 30 days were kept.[21,22,23]

In a 2013 report, OMH concluded that: 1) inpatient mental health providers had low rates of communicating with outpatient providers when arranging for follow-up care; 2) inpatient providers had low rates of referring patients to medical care follow-up when problems were identified; 3) outpatient mental health providers demonstrated little incentive to engage recently discharged patients; and 4) rates of outpatient appointments kept after discharge were higher among the managed Medicaid population compared to fee-for-service population.[23]

CARE TRANSITIONS NETWORK: TARGETING HIGH NEED PATIENTS AND HIGH IMPACT IMPROVEMENT

The CTN initiative in NYS was made possible by a Transforming Clinical Practice Initiative (TCPI) grant awarded by the Centers for Medicare and Medicaid Services (CMS). CTN joined 29 other Practice Transformation Networks around the country working to create new and replicable models of care for vulnerable populations and help provider practices move into the world of value-based payments. As the only TCPI network exclusively focused on driving quality outcomes and cost savings for behavioral health populations, CTN's goals were to reduce all cause re-hospitalization rates for people with SMI, while simultaneously helping specialty behavioral health organizations prepare for the transition to value-based payment arrangements.

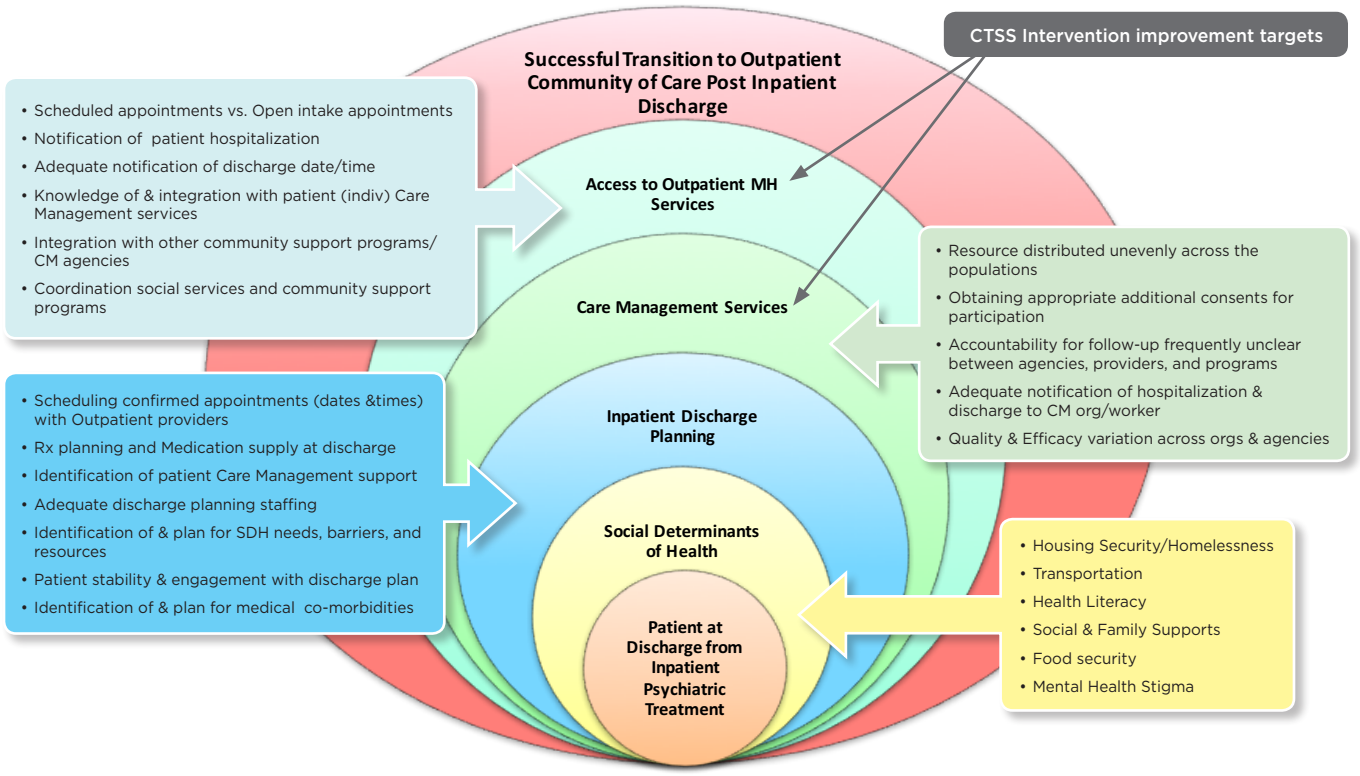
CTN enrolled 275 practices across NYS, a majority of which were outpatient specialty mental health and substance use treatment settings. Participating providers received targeted technical assistance, onsite clinical training, and individualized coaching. Providers targeted 13 quality metrics (See Appendix A) through best practice implementation, improving engagement with behavioral health treatment, and increasing focus on care coordination and continuity. Enrolled practices chose interventions and transformation activities best suited to their resources, capacity and target client populations. CTN-enrolled practices demonstrated many substantive improvements across the CTN target metrics, including increased care coordination and improved client engagement in behavioral health treatment.

CARE TRANSITION SUPPORT SERVICES: CARE TRANSITIONS NETWORK PILOT PROGRAM

To address challenges in client transitions from inpatient hospitalization to outpatient services, CTN also offered CTSS, a pilot program for enrolled inpatient units. Modeled after Montefiore Medical Center's Behavioral Health Management Organization, University Behavioral Associates, Inc. (UBA) intervention for managed care behavioral health clients, CTSS targeted the immediate 30-day window post-discharge and sought to impact the critical inpatient to outpatient care transition event, improve connection to follow-up care after hospitalization and reduce 30-day readmission.

CTSS consisted of short-term, 30-day, telephonic support and transition assessment interviews for clients discharged from a psychiatric hospitalization with the goals achieving mental health specialty outpatient visits within seven or 30 days post-discharge and reducing the incidence of 30-day mental health and all-cause readmissions. CTSS implemented unit specific processes for consenting clients and receiving referrals. At the Montefiore Medical Center psychiatric units where the CTSS team was based, referrals could be included as part of standard discharge planning. At other CTN-enrolled inpatient psychiatric units, CTSS staff would identify and consent clients to receive CTSS services. Post-discharge, CTSS care transitions managers (CTMs) attempted to reach clients by phone for the full 30-day period. When clients were not reached, CTMs attempted to contact approved collateral contacts such as family, friends, and other community supports or previous case managers. When contact with a client was achieved, CTMs assessed psychiatric outpatient appointment access and acceptability, prescribed medication knowledge and access, as well as access to medical outpatient and ancillary support services. CTSS supported clients in navigating barriers to access outpatient services such as transportation, insurance coverage, and pharmacy access, and, where relevant, connected them with long-term supportive services such as Health Home care management and other community supportive services (Figure 1).

FIGURE 1 **Transitions of Care: Elements involved in successful transitions from inpatient to outpatient mental health treatment**



The CTSS unit consisted of two supervisors and seven CTMs who served seven hospitals and a total of 11 psychiatric units over the course of the project. All inpatient units served by the CTSS program were located in the Bronx borough of NYS or Westchester County. Between March 2016 and August 2019, the unit served 4,726 unique clients with a total of 6,116 discharge events. Client demographics detailed in Table 1 show that clients were predominantly male, under age 50, Medicaid eligible and had a primary discharge diagnosis of schizophrenia (44%), depression (21%) or bipolar disorder (19%). CTSS engaged with clients regardless of insurance coverage, managed care eligibility, or other characteristics (such as diagnoses or comorbidities, utilization patterns, or socio-economic markers).

TABLE 1 **CTSS Program Client Demographics**

Total Unique Clients served by CTSS Program	**4,726**
% Male/% Female	54%/46%
Mean Age	41 years
Most Common Discharge Diagnosis	44% schizophrenia
Medicaid Coverage	62%

An additional evaluation of a CTSS client sub-sample (N=1,595) examining clinical history found that 13% of CTSS clients had a history of suicide attempt/self-harm and 48% had a history of comorbid substance use in the 12 months prior to the CTSS episode. In the six months prior to index hospitalization during which CTSS services were engaged, 37% of CTSS clients had experienced a prior mental health hospitalization and only 13% had been engaged with any care coordination. In the month prior to index hospitalization, 22% of CTSS clients had been hospitalized for any reason (mental health, medical or substance use) and only 5% had a mental health specialty clinic visit, a remarkably low level of engagement. By most standards, the clients engaged by the CTSS unit were vulnerable, not engaged in treatment, and at risk for continued hospitalizations and poor health outcomes.

Post-discharge, CTMs attempted to contact and engage clients via telephone for up to 30 days. Clients could choose to decline services at any point during the care transition episode and the case would be closed. When clients declined and were re-hospitalized, consent for CTSS support had to be obtained again. CTMs attempted to reach clients for the full 30 days, even when they did not achieve direct contact by telephone. Of the total discharge episodes referred to CTSS (N= 6,116), 20% were closed for any confirmed reason (e.g. declined services, direct transfer to other inpatient service, out of state move, etc.). Table 2 shows a breakdown of reasons for early episode closure.

TABLE 2 **Common Reasons for early episode closure (% of closed episodes < 30 days)**

Total Discharge Episodes closed < 30 days	**1,175**
CTSS confirmed Readmission to any inpatient service <30 day	33%
Client Declined CTSS Services	27%
Direct Transfer to other inpatient or residential treatment	31%
Other (Moved out of state, Incarceration etc.)	9%

CTSS care transitions managers actively engaged a total of 4,941 transition episodes. CTMs reached out to clients by telephone for the full 30-day period. When unable to reach the client, attempts were made to reach approved collateral contacts. In the last year of the project, CTSS began bi-weekly tracking of the number and percent of clients reached directly by CTMs during their care transition episode. On average bi-weekly, approximately 40% of unduplicated clients were reached directly during their care transition episode. Of the those not reached directly, CTMs often had contact with family members, spouses, friends, health home care managers, other case workers, or outpatient providers. Even when a client could not be reached, the CTM continued to follow-up with outpatient providers to confirm outpatient appointment attendance and health home referrals.

CTSS STORIES FROM THE FIELD

Throughout the project period, CTSS focused on client engagement and client-centered approaches with CTMs, including open communication and responsiveness to client needs and concerns. Although CTSS did not utilize a client satisfaction tool, clients did provide comments and direct feedback to CTMs, CTSS supervisors, and even inpatient partners on their experiences. CTMs often shared client stories that reflected their experiences, successes meeting client needs and navigating a complex health system, as well as positive feedback they received from clients and collateral contacts.

STORY 1

I worked with a pregnant woman discharged with a diagnosis of bipolar disorder. The client had a long history of non-compliance with medication and outpatient mental health treatment. She was initially not receptive to establishing communication with a care transitions manager. I was able to work with her in her own language, without a translator, and discuss shared cultural experiences. We built a rapport through our conversations and, eventually, I was able to discuss the treatment options offered to her.

I was able to assist the client not only in recognizing the importance of taking care of her mental and physical health in preparation for the arrival of her child, but also in reaching out to her family support network to get additional help. The client was able to get the help of her mother in making and attending her various appointments. Working with her mother, together we were able to help the client locate outpatient providers more accessible to her.

After the client attended a few of these appointments, she shared with me that she liked her new outpatient service providers, felt that they were very helpful to her, and that these experiences reaffirmed her commitment to outpatient mental health treatment as well as prenatal care. She was more confident in her ability to ask for and get support from her family, especially her mother, and that they would help with her continue treatment.

STORY 2

A client was very hesitant to enroll in CTSS. During his hospital admission, after sitting in several of my groups over the course of a few weeks, he finally enrolled on the day he was being discharged. I was assigned as his care transitions manager and when I reached out to him, he was pleasant and eager to talk to me. He attended all his aftercare appointments and took his medication as prescribed. Before closing his case, I reached out to him one last time and he said he appreciated my patience with him throughout his time on the unit. Initially he was hesitant to sign up for the program but in the end, he was glad he enrolled.

STORY 3

During an inpatient CTSS group, a client shared that he had utilized CTSS services after a previous admission and felt supported in his previous experiences with us. He contributed to the CTSS presentation and attested to the work we do as care transitions managers. He mentioned that he welcomed the phone calls reminding him of his appointments and that we helped keep him on track even though it was hard. Other clients in the group appreciated hearing about his experience. As a result, more people showed interest in the CTSS presentation and were enthusiastic about enrolling in the program.

STORY 4

A client I was working with was struggling after her discharge. Her mother was very concerned and expressed fears that her daughter would either have to be readmitted or seriously hurt herself. Although this client was following through on her treatment plan, her therapy sessions, medication and regular doctor appointments, she felt she would never get better.

Her mother decided to move down south to be close to family and to give her daughter a better opportunity to receive more intensive care. The mother identified an intensive multi-service behavioral health practice near their new home. She had already begun the process of completing paperwork to initiate a referral to the program but was not making progress on her own and asked me to help complete the referral process and get and intake appointment scheduled. The family was moving before the 30-day CTSS transition would be completed and I had two weeks to assist them.

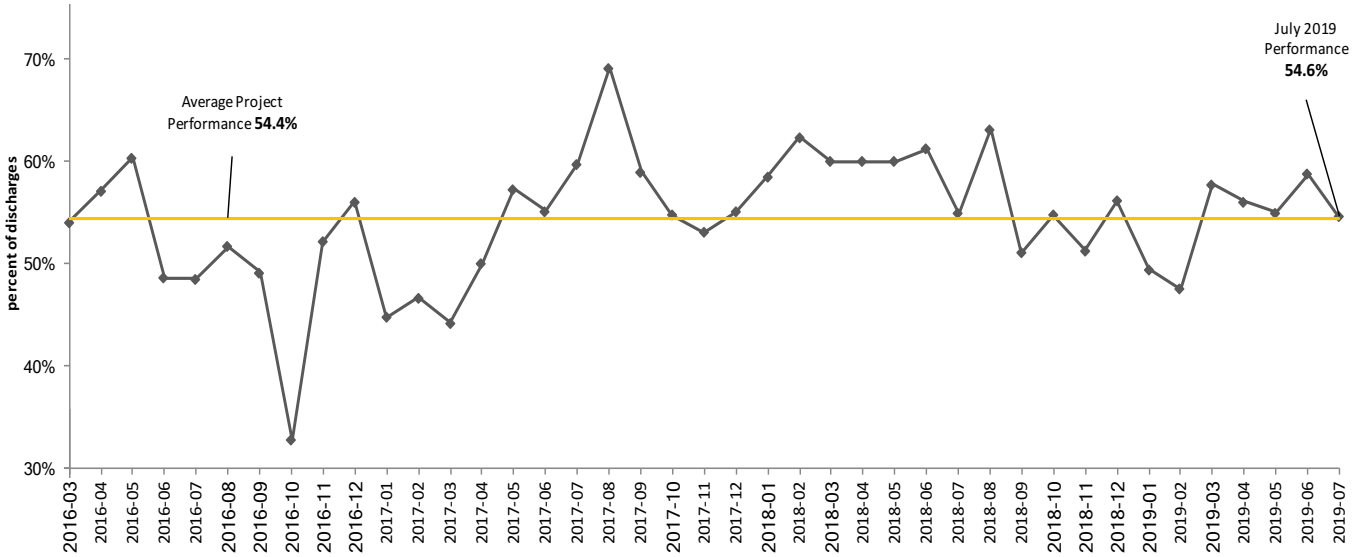
I called the facility and was able to work with the staff to set up a profile for my client, get her referral completed and reviewed and schedule an intake appointment with a provider. After receiving the appointment confirmation, the mother and the client expressed hope and excitement about the possibility of receiving the help that they believed would be most beneficial.

CTSS PROJECT OUTCOMES: PERFORMANCE METRICS

The primary outcome measures for CTSS were follow-up after hospitalization within seven days and 30 days. CTMs confirmed client outpatient appointment attendance with the provider during the 30-day transition period. In cases where the provider could not be reached and attendance could not be confirmed during the care transition episode, attendance reporting updates were made using the NYSOMH Psychiatric Services and Clinical Knowledge Enhancement System for Medicaid (PSYCKES) portal and follow-up calls with providers.

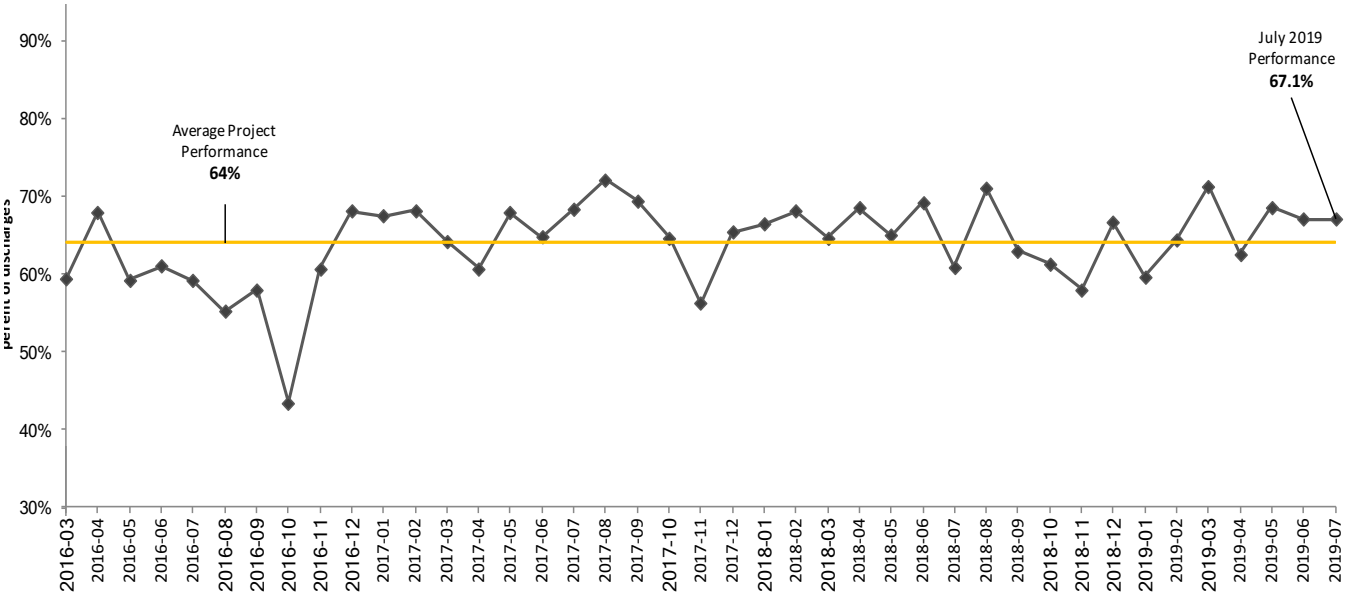
Performance varied across the life of the pilot (Figures 3 and 4). The average seven-day follow-up was 54% with a monthly performance range between 32%-62% and average 30-day follow-up was 64% with a monthly performance range between 44%-72%.

FIGURE 3 CTSS Pilot Project Performance: 7 day Outpatient MH Follow-up after Hospitalization



Performance measurement was unreliable during the early months of implementation due to low monthly referral numbers, creating small denominators. As implementation continued, CTSS encountered challenges with inpatient unit partners, referral processes, client engagement, preferences and resources, which will be discussed in subsequent sections. Although measurable improvements were made in internal processes, relationships with inpatient unit partners and client experience, 30-day follow-up performance remained in the 60-70% range (Figure 4).

FIGURE 4 CTSS Pilot Project Performance: 30 day Outpatient MH Follow-up after Hospitalization

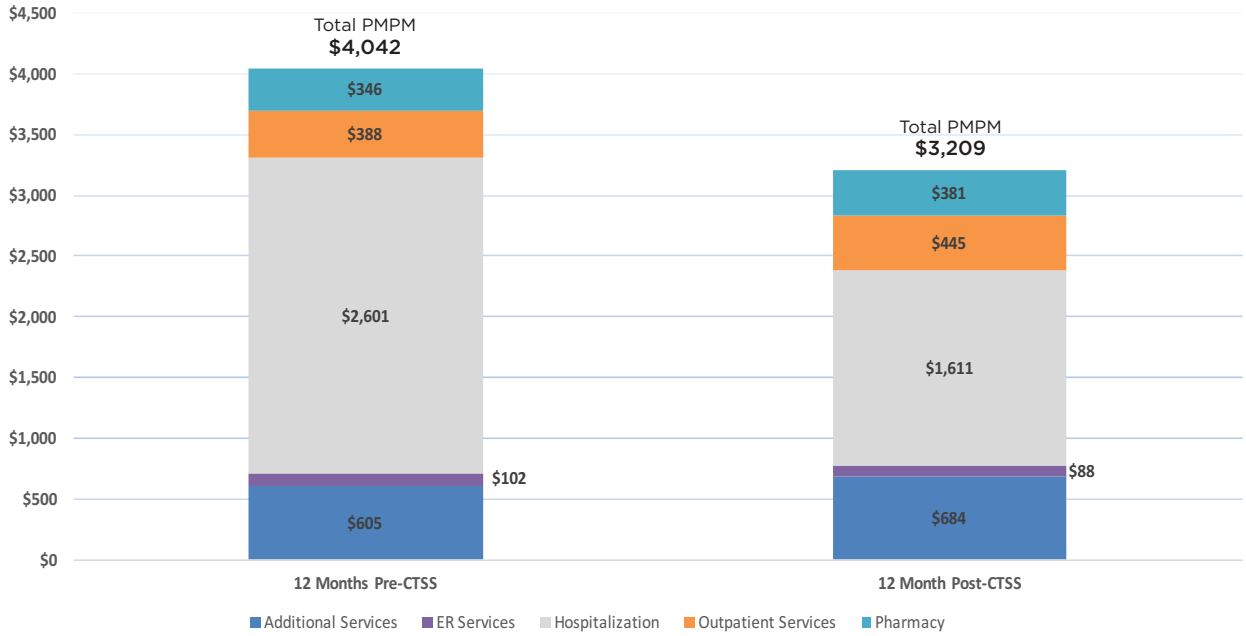


CTSS PROJECT OUTCOMES: COST SAVINGS

Using the NYS Medicaid Data Warehouse, which includes all paid claims data for NYS Medicaid beneficiaries, CTN analyzed the cost savings impact of CTSS. Analysis included CTSS Medicaid clients served between April 2016 and June 2018 (Pre-Period N=1,477 and Post-Period N=1,427). For each client, Medicaid claims for 12 months prior to the first CTSS managed discharge event and 12 months post care transition episode were analyzed for differences in total cost of care, expressed as per member, per month (PMPM). Analysis included PMPM costs of care and utilization patterns in specific areas such as inpatient hospitalizations, outpatient services, emergency department care, and ancillary supportive services such as transportation, home health, and health home care management. Discharges managed after June 2018 were not included in analysis due to insufficient time lag to ensure inclusion of complete[i] claims.

Cost analysis found an average total cost of care reduction of $833 PMPM for CTSS clients (Figure 5), a 21% decrease in overall costs between pre- and post-periods. When aggregated across the 12-month Cost analysis found an average total cost of care reduction of $833 PMPM for CTSS clients (Figure 5), a 21% decrease in overall costs between pre- and post-periods. When aggregated across the 12-month post-period for the 1,427 Medicaid clients included in analysis, this represents $14,264,292 in total savings. Extrapolating PMPM savings for the additional 915 unique Medicaid clients served by CTSS between July 2018-July 2019 would result in an additional potential savings of $9,146,340.

FIGURE 5 **Cost Savings Analysis: 12 months pre & post CTSS**
CTSS Clients from April 2016 to September 2018



i. Medicaid claims are often incomplete due to delays in billing, disputed bills, and other irregularities. In order to ensure completeness a minimum three-month lag is included in all MDW claims analyses.

In addition to cost savings, positive shifts in utilization and supportive services were identified. As demonstrated in Table 3, most savings were realized through a 38% reduction in total hospitalization costs. Mental health hospitalizations (represented by discharges per 1,000) saw a 48% reduction, the largest percent change of tracked utilization measures. Medical hospitalizations were reduced by 38% and substance use treatment hospitalizations by 11%. CTSS interventions also focused on removing barriers to continuous treatment through increased linkages to supportive services. As a result, there was a 22.1% increase in behavioral health outpatient treatment and 12.7% increase in primary care utilization. Pre- and post-cost trends increased utilization in support services such as health homes, care management and transformation as well as decreased emergency department (ED) utilization.

TABLE 3 **Changes in Targeted Health Services Costs & Utilization Pre- & Post-CTSS**

Total CTSS Medicaid Clients	12 Months Pre-CTSS	12 Months Post-CTSS	Percent Change
	1,477	**1,427**	
Outpatient Utilization & Costs			
Article 31 Visits per 1,000	7,040	8,596	**22.1%**
Medical PCP Visits Per 1,000	11,401	12,846	**12.7%**
Total Outpatient PMPM ($)	$388	$445	**14.7%**
Outpatient Utilization & Costs			
Medical Discharges Per 1,000	582	418	**-28.3%**
Mental Health Discharges Per 1,000	1,765	920	**-47.9%**
Substance Use Treatment Discharges Per 1,000	556	494	**-11.0%**
Total Hospitalization PMPM ($)	$2,602	$1,610	**-38.1%**
Outpatient Utilization & Costs			
ED Utilization Total PMPM ($)	$102	$88	**-13.7%**
Home Health Services PMPM ($)	$78	$114	**46.2%**
Case Management (Health Home) PMPM ($)	$82	$102	**24.4%**
Transportation Services PMPM ($)	$88	$116	**31.8%**

LESSONS LEARNED THROUGH IMPLEMENTATION

CTSS was designed using Montefiore's successful care management experience and evidence supporting efficacy of short-term interventions post-discharge from a hospitalization.[3,5,10,31,30] CTSS was intended to be a simplified, centralized care management program, working with all discharged clients regardless of primary or comorbid diagnoses, insurance coverage or line of business, housing status or other demographic criteria. CTSS sought to be client-focused, simplifying interactions with a complex health care system and supporting clients in navigating connection back to their usual care providers and other supportive services. Despite challenges and barriers, CTSS achieved improved care coordination and cost savings through a process of program assessment and continuous quality improvement.

LESSONS LEARNED: COLLABORATION WITH INPATIENT UNITS

Early implementation of CTSS identified several operational challenges to successfully orienting and connecting clients to CTTS. CTSS was able to overcome these barriers through close collaboration with inpatient units and iterative problem solving. Lessons learned include:

Establish clear processes, roles and responsibilities regarding consent and engagement. CTSS program design initially relied on inpatient unit willingness and ability to include an external care transition service into their discharge planning. A critical assumption was that all clients discharged from enrolled inpatient units would automatically be referred to CTSS as part of their discharge and care transition planning and that introduction to the program and consent for services would be included within the internal inpatient consent or separate consents completed with inpatient unit staff. An integrated process of consent and referral, as in the initial implementation design, would have ensured that CTSS staff received early notification of inpatient admission and referral, prompt notification on the day of discharge and would have a confirmed contact number or collateral contact for telephonic follow-up.

In reality, many hospitals could not legally allow for automatic enrollment of clients into an external care transitions program and did not incorporate CTSS program consent within internal unit consent processes. Once it became apparent that independent, specific consent would be required for each inpatient unit, CTSS introduction and consent processes represented an additional administrative burden to unit staff, requiring alteration or development of new workflows for inpatient units. Without inpatient units generating automatic referrals via a standard discharge planning process, other processes broke down. Clients were not aware of the CTSS program purpose or benefits, CTSS could not receive prompt notification of admission or discharge or receive client discharge summaries that included necessary outpatient referrals and other coordinated care referrals.

To address these barriers, CTSS worked in collaboration with inpatient units to determine processes for consent, client engagement, referrals, and discharge notification and summaries. CTSS supervisors and CTMs worked with inpatient units to develop workflows specific to sites that included CTM visits to hospital inpatient units one-to-two days per week to lead client engagement and consent processes. Over time, collaboration enabled CTMs to shift from individually engaging and consenting clients to conducting education and consent groups, referred to

as "discharge groups." During these groups, CTMs discussed the CTSS program, the benefits of short-term support post-discharge, and assisted clients in completing consent forms.

Establish clear workflows for discharge notifications and handover. Notification of discharges and sharing discharge plans was required within 24 hours for CTMs to initiate client contact and ensure compliance with seven-day follow-up. Although CTMs were on units two or three days a week, reliance was largely on inpatient unit staff to notify them of individual client discharges, which predictably resulted in notification delays. CTSS supervisors worked with hospital and unit leadership to create discharge communication workflows. Solutions ranged from read only access to EHRs and other data systems, automatic faxing of discharge records by hospital administrators through formal "referral" to CTSS program in the discharge document, and daily faxed discharge lists for CTSS follow-up. Successful implementation required consistent collaboration with units, weeks of iterative learning and workflow adjustment and CTSS willingness to take on the administrative burdens of communication.

Unclear responsibility for the clients during moments of transition continues to be a challenge. Hospitals and outpatient providers did not own responsibility for the client during the time between inpatient discharge to the moment of outpatient intake. Current contract and accreditation requirements are insufficient incentives. As demonstrated in the earlier lessons learned above, it was essential that the CTSS program take responsibility and step into a larger role.

LESSONS LEARNED: IMPROVING CLIENT ENGAGEMENT AND CONTACT

Challenges and barriers related to client engagement and communication also emerged in the care transition period. Challenges included program acceptability to clients, accurate and updated contact information, and low-client engagement.

Improve efficiency by engaging groups rather than individuals where possible. Initially, CTMs on units engaged with clients and received consent for CTSS services individually. Quickly identified as a time consuming and ineffective process, CTSS advocated for and collaborated with one unit to offer client groups that introduced the CTSS program and consent clients. Success with this unit allowed CTSS to expand the approach to other units, with both CTMs and inpatient units expressing confidence in the group model for streamlining the consent and initial referral process.

Ensure standardized collection of necessary information. Discharge groups provided opportunity to address other challenges and barriers in client education and information gathering. Client discharge summaries did not consistently include updated client contact information (i.e. addresses, home phones, cell phones) or approved collateral contacts for the client (i.e. a family member, friend, a supportive community organization, or care management service). CTMs began using the group consent process to discuss the value and importance of updated contact information and an identified approved collateral contact. Quality improvement cycles were used to improve collection of contact information, rates of contact attempts, and tracking of direct client contact. Internal process measures, such as rates of attempted client contact and percent of clients reached directly, were tracked bi-weekly, and demonstrated improvement over time. Rates of direct client contact realized a 10% improvement

between November 2018 and July 2019. Despite these efforts, challenges of contacting clients post-discharge by phone did not completely alleviate this. In any month, between half and two-thirds of clients in the care transition period were not successfully reached directly by phone.

Engage clients through education and identification of needs. The group setting elicited client concerns and needs and provided an opportunity to address them. Clients were frequently confused about alignment of CTSS and other care management services or supportive programs they had received in the past. Many clients could not identify preferred outpatient providers and voiced skepticism about both the value of services and the effectiveness and side-effects of their medications. Often clients faced basic challenges such unstable and uncertain housing, unreliable phone services (either cellphone or landlines), and concerns with their relationships with support networks such as family and friends. Discharge groups assisted CTMs in early identification of clients who would need significant additional assistance such as housing services, immigration services, insurance enrollment services, special contact arrangements, and other specialized support. CTMs often alerted inpatient staff and worked with their CTSS supervisors to identify programs or services to meet the clients' needs and begin the referral process.

ADAPTING TO ENGAGE CLIENTS

CTSS leveraged the opportunity to address and discuss common client concerns prior to discharge through groups. Working with CTN partner, Northwell Health, CTSS staff collaborated in the adaptation of a client engagement module, *Staying Well and Achieving Goals (SWAG)*, specifically for inpatient clients and their post-discharge concerns. *Staying Well and Achieving Goals: Speaking Up for Your Wellness* included group discussion options covering medication safety, discussing medication side-effects with providers, and communicating the need to cancel or reschedule an appointment. The goals of the *Speaking Up for Your Wellness module* were to help clients to think in advance about participating in their outpatient appointments, provide an opportunity for clients to explore solutions to common situations that they may experience as outpatients, encourage discussion and interaction about the solutions and increase client's confidence in speaking to the doctor during their outpatient appointments. *Speaking Up for Your Wellness* included client handouts to help CTMs organize and lead the discussion and encourage inclusive discussion.

Changes in the group methods and topics occurred late in the CTSS project and were in place for the final three months of the project. No formal evaluation was conducted, however CTMs and supervisors participated in implementation discussions with the Northwell team that developed the SWAG modules and discussed client acceptability, successful collaboration with inpatient units in leading group discussion, group facilitation and participation. Both CTMs and inpatient units felt that the modules were a positive change that encouraged many clients to speak up about challenges they faced post-discharge. In all phases of group implementation, clients responded positively to in-person CTM interactions, became engaged around discussion of concrete post-discharge issues

that they faced, and responded more positively to telephone support post-discharge. Client testimonials and feedback are included in the client stories shared in the prior section. The process of formalizing group discussion and including topics that engaged clients in open discussion had the ancillary benefit of improving collaboration with inpatient staff, who perceived groups as a positive and supportive activity for their clients. This was an intervention that was more visible to them than the CTSS client support that occurred post-discharge.

Face-to-face relationships are essential. Engaging clients required in-person interaction through the facilitation of discharge planning groups. Putting these groups in place quickly increased the number of clients engaging in CTSS and responding to follow-ups. Similarly, engaging and gaining the cooperation of inpatient unit staff required CTMs staff going on the inpatient units.

Engagement is most successful early. Most successful client engagements occurred in the first seven days. As discussed, the average seven-day follow-up was 54% with a monthly performance range between 32%-62% and average 30-day follow-up was 64% with a monthly performance range between 44%-72%. This means that on average, there was only a 10% increase in attendance for an additional 23 days of effort. It can be inferred that if clients were not engaged very soon after discharge, they were not likely to become engaged.

TRANSITIONS OF CARE REMAIN AN OPPORTUNITY FOR QUALITY AND COST SAVINGS IMPACT

Transitions of care following a psychiatric hospitalization remain a critical moment for supporting clients, particularly those with SMI, to re-engage successfully with their outpatient community of care. Many programs, including CTSS, have demonstrated impact on improving outpatient follow-up after hospitalization, reducing readmissions, and reducing other risk factors such as ED utilization, even in the highest risk and hardest to engage populations1,2,30,31.

In a health care environment currently focused on driving improved client experiences and outcomes through value-based arrangements, focus on behavioral health populations and interventions which successfully transition behavioral health clients from inpatient services and engage them in continuous care is critical to driving improved health outcomes and maximizing cost-savings. The substantial cost savings realized through a small-scale pilot such as CTSS further underscores the potential impact of focused supports for high-cost, high-need clients.

High quality post-hospitalization care transitions represent a convergence between the greatest potential for cost savings and a critical target area to improve the quality of service and health access experience of behavioral health clients. During these transitions, most clients are disengaged from care and experiencing first-hand the fragmentation between health service areas — inpatient to outpatient, medical and behavioral health care, and a myriad of care management and supportive services each targeting a specific service area. Simplifying and streamlining approaches to behavioral health inpatient to outpatient care transitions requires multiple stakeholders with a comprehensive approach to population health management in order to maximize savings

and spread impact. The CTSS pilot demonstrates that care transitions can work, but to achieving improvements requires leadership, collaboration, flexibility and dedicated resources.

The recommendations within this paper are intended to assist provider communities develop an approach to care transitions planning through collaborative, adaptive program design and population health management based on lessons learned from CTSS program implementation, experiences of clients and providers, and evidence from extensive literature on care transitions for behavioral health populations.

RECOMMENDATIONS FOR CARE TRANSITIONS PROGRAM PLANNING

Utilize collaborative program design and include a variety of stakeholders committed to creating successful care transitions for clients discharged from psychiatric hospitalizations. Stakeholders should include (but are not limited to): hospital leadership, inpatient unit staff including administrative support and discharge planners, care transitions case workers, representatives from outpatient service providers and other community supportive services, and clients.

Understand and address administrative needs head on. Successful communication between inpatient unit staff, large numbers of outpatient providers and care management programs requires a significant increase in information sharing and administrative tasks. Such tasks are essential for managing and tracking referral processes and standards, consent processes, payment and billing processes, and effective discharge and care transitions workflows across organizations. When establishing a formalized approach to transitions of care, all needs should be identified as early as possible and clear roles and responsibilities detailed.

Include clients in the creation of client-centered referral processes and client engagement strategies to ensure acceptability of care transitions supportive services post-discharge. Combine data analytics with client insights to routinely examine care linkage and engagement failures and opportunities.

Engage policymakers and payers in value-based models and pilots focused on optimizing care transitions. The existing fee-for-service reimbursement structure is not conducive comprehensive transitions of care that foster strong collaboration between inpatient and outpatient providers, and novel funding arrangements will need to be considered. Many states are pushing public managed care plans into value-based arrangements with behavioral health providers and increasing their responsibility for cost savings in behavioral health populations. The expertise of behavioral health providers in designing successful and impactful programs will be critical.

Invest in evidence-based quality improvement training for leaders and service delivery staff. Use quality improvement methods and adaptive implementation strategies to ensure implementation effectiveness, process sustainability, and program outcomes.

Create population health management models that include the greatest number of clients potentially impacted by a care transitions intervention. Utilize standardization of workflows, consent processes, data and information sharing arrangements, and health information exchanges to encourage co-management throughout a health service area or region.

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APPENDIX A: CARE TRANSITIONS NETWORK CLINICAL QUALITY MEASURES

INDICATOR	NATIONAL STANDARD	NUMERATOR	DENOMINATOR (ALL 18-64 YEARS)
All-cause 30-day readmission rate following mental health (MH) inpatient discharge	NYS	Number of all-cause hospital readmissions after MH inpatient discharge in measurement period	Total number of MH inpatient discharges (primary mental health diagnosis) in measurement period
30-day MH readmission	NYS	Number of MH readmissions in measurement period	Total number of MH inpatient discharges (primary mental health diagnosis) in measurement period
Follow-up after hospitalization for mental illness, 7 days	NQF 0576 PQRS 391 HEDIS FUH-A	Number of all-cause hospital readmissions after MH inpatient discharge in measurement period	Total number of MH inpatient discharges (primary mental health diagnosis) in measurement period
Follow-up after hospitalization for mental illness, 30 Days	NQF 0576 PQRS 391 HEDIS FUH-B	Number of MH readmissions in measurement period	Total number of MH inpatient discharges (primary mental health diagnosis) in measurement period
Adherence to antipsychotic medications (PDC) for people with schizophrenia (%)	NQF 1879 PQRS 383 HEDIS 2016	Number of people with schizophrenia or schizoaffective disorder with adherence to antipsychotic medication (defined as a proportion of days covered [PDC]) of at least 0.8 during the measurement year	Total number of people with schizophrenia or schizoaffective disorder with 2+ claims for any antipsychotic medication during measurement year
Adherence to mood stabilizers for people with bipolar I disorder (%)	NQF 1880	Number of people with Bipolar I Disorder that received a mood stabilizer that had a Proportion of Days Covered (PDC) for mood stabilizer medications (including AP) ≥ 0.8 during the measurement year	Total number of people with Bipolar I Disorder who fill 2+ prescriptions for a mood stabilizer in measurement year
Use of antipsychotic drug clozapine for schizophrenia	NYSOMH	Number of people with schizophrenia with 1 or more clozapine claims in measure-ment year	Total number of people with schizophrenia during measurement year

INDICATOR	NATIONAL STANDARD	NUMERATOR	DENOMINATOR (ALL 18-64 YEARS)
Use of antipsychotic long-acting injectable (LAIs) for schizophrenia	HEDIS v2016	Number of people on antipsychotic medication who received 2 or more concurrent antipsychotic medication prescriptions for > 90 days during measurement year	Total number of people ages 18-64 years who were on antipsychotic medication > 90 days in the measurement year
Diabetes screening for people with schizophrenia or bipolar disorder who are using antipsychotic medications (%)[ii]	NQF 1932	Number of people with schizophrenia and diabetes who were dispensed an antipsychotic medication and had a diabetes screening during the measurement year	Total number of people with schizophrenia or bipolar disorder who were dispensed an antipsychotic medication in the measurement year
LDL screening for people with schizophrenia or bipolar disorder who are using antipsychotic medications (%)	NQF 1927	Number of people with schizophrenia and diabetes who were dispensed an antipsychotic medication and an LDL-C test during measurement year	Total number of people with schizophrenia or bipolar disorder with 1+ antipsychotic in the measurement year
14-day initiation and engagement of alcohol and other drug (AOD) dependence treatment (14 days)	NQF 004 MU 137v4 PQRS 305	Number of people with a new AOD episode in first 10.5 months of the measurement year and received AOD treatment through an inpatient admission, outpatient visit, intensive outpatient encounter or partial hospitalization within 14 days of the index episode start date	Total number of people diagnosed with a new AOD episode (alcohol or other drug dependency) during the first 10.5 months of the measurement year
Engagement of AOD dependence treatment (30 days)	NQF 004 MU 137v4 PQRS 305	Initiated treatment and who had 2 or more additional services with a diagnosis of AOD within 30 days of the initiation visit	Total number of people diagnosed with a new AOD episode during the first 10.5 months of the measurement year

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