**Review Article**

**Transitional Care Intervention for Behavioral Health**

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**Abstract**

A transitional care plan is designed to promote the safe and timely passage of patients between levels of health care and across care settings, including mental health treatment facilities. Mental health patients experience gaps in treatment after discharge from one level of care to the next level of care is a challenge. The Doctoral of Nursing Project (DNP) sought to answer the PICOT question: In adult patients enrolled in the Intensive Outpatient Program (IOP) (P), how does implementing a transitional plan of care (I), compared to current standard practice (C) impact the percentage of clients who receive discharge planning to the next level of care (O) in 12 weeks (T)? The project site is an Intensive Outpatient Program (IOP) for mental health clients. The project implemented a quality improvement process for transitional care plans by utilizing the evidence-based practice (EBP) screening tool, the Health of the Nation Outcome Scales (HoNOS). The gap in practice was that 37 (31%) out of 121 patients were discharged without a feasible transitional care plan. The data analysis revealed patient outcomes for four of six (66%) patients who received a transitional care plan upon discharge and five of six (83%) patients who received a follow-up phone call after discharge. One limitation is the patient leaving before the discharge process completion against medical advice. The project's results suggest that mental health treatment facility staff should implement a transitional protocol during discharge.

**Keywords:** Discharge planning; Health system in transition; The transition of care; Transitional care interventions

**Introduction**

Transitional care planning for mental health clients is a complicated process that strives to secure the patients' care transition from one level of care to the next level of care. Patients' needs and resources are identified through screening, and multidisciplinary interventions from different care providers match the identified needs. Deficits in the discharge planning process, such as poor communication and collaboration among care providers, and the lack of post-discharge support, can cause risk-filled breakdowns in the continuity of care. The breakdown and risk of harm may lead to unfavorable impacts for the patient, such as delayed discharge, readmission, extended waitlist, and inadequate post-discharge care [1].

**The Focus of the Project**

The aim of the quality improvement project was to improve the transition of care process occurring at discharge to and increase the percentage of mental health patients who received transitional care plans to the next level of care after discharge. The project site is an Intensive Outpatient Program (IOP) in the northeast specializing in intensive outpatient treatment for mental health clients. The project implemented a quality improvement process for transitional care plans by utilizing the Evidence-Based Practice (EBP) screening tool, the Health of the Nation Outcome Scales (HoNOS) scale (Appendix A), to screen patients upon admission [2]. The addition of the screening did result in the caseworkers generating an individualized patient-centered transitional care plan. The transitional care plan, which reduces patients' risk while moving between different health care institutions and providers, was overseen by the project leader, program director, psychiatrist, and caseworkers.

The project objective was to increase the percentage of mental health patients discharged to the next level of care. The interventions implemented was first initial screening (Appendix A) The second was patient and staff meeting to initiate the transitional care plan. The third was initiation and ongoing use of a discharge checklist to engage the patient throughout the discharge process (Appendix B). The fourth intervention was a follow-up appointment to the next level of care before the patient's discharge, and the fifth intervention was a follow-up phone call (Appendix C) day 7 after discharge. The PICOT question was, in adult patients enrolled in the Intensive Outpatient Program (IOP), how does implementing a transitional plan of care, compared to current standard practice, impact the percentage of clients who receive discharge planning to the next level of care in 12 weeks? Transitioning from acute mental health treatment programs to community care is a vulnerable period. Patients can experience additional risks for loss of mental and psychological well-being within the venerable transitioning period [3]. Patients are known to transition between hospital and community care repeatedly due to identified challenges such as poor information sharing between services and increased risk of suicide from depressive symptoms [4].

**The Relevance of the Project**

Hospital readmission and frequent emergency room use among patients with mental health-related disorders indicate poor access to services or inadequate continuity of care plan [3]. The quality improvement project provided an evidenced-based tool intervention that caseworkers and nurses can implement to improve the discharge planning process for mental health patients. Caseworkers and nurses can also utilize information from this project to implement a transitional care routine processing for positive patient outcomes after discharge. While nurses were not part of the project, the relevance to nursing included how nursing can support discharge education and planning by applying Orem's theory of self-care deficit through education and during discharge to promote independence and self-care after discharge [5]. A discharge plan may start in an acute care facility and continue in the community or at home.

 Mental health patients are considered a vulnerable population and require consistent oversight. Continuity of care is a significant factor in promoting patient safety in mental health care. A written discharge plan improves communication between healthcare professionals across settings upon discharge [6]. The lack of discharge planning could lead to ineffective care for patients and increase the risk of relapsing, adverse effects on patient's quality of life and living standards, and readmission, causing a financial impact on families and health care costs [7]. There are also social implications. The venerable mental health patients may receive care from friends and family after persistent suffering from mental disorders resulting from inefficient healthcare processes, such as the lack of transitional care plan upon discharge [8]. The lack of discharge planning demonstrates a lack of adherence to discharge protocols, which increases the length of stay and healthcare costs [8].

**Project Description**

Discharge planning is a required complex process that must be ongoing to provide an optimal handoff and care transfer from one level of care to another or discharge to the community [1]. An optimal transfer of care has four primary required actions. All four actions are equally important. The first transition of care intervention was the completion of the HoNOS scale (Appendix A). The program facility director carried out this task. As anticipated, the application of the HoNOS scale and the conclusion resulted in the caseworkers generating an individualized patient-centered transitional care plan. In addition, the HoNOS scale assisted caseworkers in measuring behaviors, impairments, symptoms, and social functioning, which served as a determining factor for discharge readiness.

The second intervention was the initiation of a project leader-developed discharge checklist (Appendix B). The caseworkers completed the discharge checklist in tandem with the patients to identify medication changes, discharge expectations, and provisioning of additional care if needed [9]. The discharge checklist served as an ongoing mutually directed discharge process map for the caseworker and the patient. The checklist included the case manager selecting the next level of care and if the caseworker has scheduled a follow-up appointment. The expectation of a follow-up telephone call after discharge is listed. A predischarge medication review and patient education items are for selection and description.

The third intervention prior to discharge was to ensure a follow-up to the next level of care provider appointment was scheduled. The caseworkers completed the intervention. The caseworkers established a system that allowed the front desk staff to track the scheduled follow-up appointments. The checklist provided a space for the notation of the scheduled appointment date and time. The action column on the checklist allowed patients to take notes, monitored their health, tracked fundamental symptoms, and shared that information between visits.

The last intervention was a follow-up telephone call to occur seven days after discharge (Appendix C). The intervention was completed by the caseworkers and the front desk staff. The purpose of the follow-up telephone call was to reconcile patients' medication records by ascertaining the current medication list focusing on the newest additions, affirming connection with their next level of care, and seeing to address concerns.

The provision of a discharge plan is an essential start to an optimal discharge processing to the next level of care transition. [10]. At the project site, the discharge instructions consisted of a list of community providers to self-schedule the next level of care follow-up appointments and a current medication list. There was no client discharge checklist, no staff scheduled follow-up appointments, nor follow-up telephone post-discharge. One advantage of follow-up telephone calls is that out-reaching directly impacts adherence to the post-discharge treatment plan with an avenue for prompt reporting of untoward events.

Flink, et al. [11] found that an uncoordinated care transition burdens patients' ability to navigate the healthcare system and adds stress to patients' support teams.

The follow-up consultative process of out-reach telephone calls helped meet the patient's current needs, anticipate continued needs, and referral to available resources. Successful discharge planning is the cornerstone of an effective transition to the community and the next level of care [12]. An appropriate transitional care plan may assist in minimizing and preventing readmissions. Literature shows that one-half of potentially preventable readmissions were linked to a lack of discharge planning [13]. Implementing a well-defined transitional care process culminating in a problem-free discharge event will help to mitigate the financial and emotional burden of readmission [9].

**Significance of the Problem**

The information given to mental health patients before discharge is vital to the patient's well-being and reduces readmission costs and stress on the patient and family [14]. All readmissions and especially psychiatric readmission, negatively impact the patients, families, and the health care system. [7] found 30-day and one-year readmission rates of psychiatric patients to be 16.69% and 33.79%, while 29.34% were readmitted three times or more within one year. Almost one in seven psychiatric patients needed rehospitalization within 30 days of discharge due to a lack of suboptimal transition of care [7]. The inadequacy in discharge planning and unplanned readmissions could cause misutilization of hospital services and create a higher cost to the health system [14].

**The Organization's Practice**

The aim of the quality improvement project was to optimize the transition care process occurring at discharge to increase the number of patients who received transitional care plans upon discharge. The objective was to increase the number of patients who received a transitional care plan from one level of care to the next. The project's site gap data were 37 (31%) out of 121 clients discharged from the mental health program received discharge planning. Also, the caseworkers only provided a list of community providers for patients to self-connect to self-schedule a follow-up appointment to the next level of care after discharge. According to the Agency for Healthcare Research and Quality [15] findings, 40 % to 50% percent of patients with a history of repeated psychiatric hospitalizations are readmitted within 12 months of been discharged.

The project site readmission rate was 20 -30 % between 30 days to 12 months after discharge from the program facility. Tyler, et al. [6] noted that upon discharge, a written discharge plan improves communication between healthcare professionals and patients by emphasizing the required knowledge across settings. The lack of discharge planning could lead to ineffective care for mental health patients and increase the risk of relapsing, putting the patient at risk of readmission, which places financial implications on families and healthcare costs [3]. Additionally, relapsing affects the patient's quality of life and living standards due to continued illness [7].

**Available Knowledge**

A literature review was conducted using the databases MEDLINE, Embase, Cochrane Library, CINAHL, PsycINFO, and Psyndex. The publications were limited to the last five years between 2017 and 2022. The literature keywords used in the literature search included hospital discharge planning, the transition of care, transitional care interventions, health system in transition, and effective discharge planning. The following criteria were considered: published studies or study protocols written in English, capturing participants aged between 18 and 65, and participants who had a psychiatric diagnosis and were discharged from the psychiatric inpatient unit. The interventions considered included improving discharge from psychiatric inpatient care to home with a combination of predischarge and postdischarge components.

All intervention components were deemed as having stemmed from the inpatient setting. Articles with nonrandomized or one-group study designs were included. A total of 72 articles were discovered, of which 21 were utilized. Fifty-one were excluded due to their outdated statuses and irrelevance to the main subject. Other elements of the exclusion criteria included articles with similar contents and a small sample size that would affect the generalizability of the study. After a thorough screening process, the 21 articles that sufficed the inclusion criteria were used in informing this project and providing evidence for the hypothesis and the project's efficacy in meeting its objectives. The selected articles addressed different literature gaps relevant to this project's theme.

Extant literature identified that effective discharge planning, care coordination, the impact of transitional care, and plan and post-discharge support care are vital to reducing avoidable hospital readmissions. Mental health patients discharge from acute mental health programs to community care settings is often a vulnerable period in the pathway, where people can experience additional risks and worsening conditions [7]. The themes for the project are the impact of poor discharge plans, care coordination during patients' transition, screening tools to assist with an assessment before developing a transitional care plan, and how a transitional care plan impact patient outcome and post-discharge follow-up.

**Impact of Poor Discharge Plan**

Discharged individuals from acute mental health services are at a much higher risk than the rest of the population for a range of fatal worsened conditions and adverse outcomes, such as suicidal ideation, emergency room visit, and rehospitalizations [6]. In addition, the gap in treatment for patients with mental health conditions is significantly high due to the lack of transitional care plans to the next level of care [16]. A transitional care plan seeks to enhance patients' knowledge and ability to access post-discharge care plans and support patient involvement that aligns with the patient's needs [9,17,18].

**Care Coordination during Patients Transition**

Transitional care plans help to bridge the gap and improve continuity of care in mental health treatment through effective care coordination between settings while considering patient-centered needs during the transitional period [19,20]. In addition, effective communication between care providers is essential during the discharge process, particularly for patients with complex needs or multimorbidity who have experienced or continue to experience significant challenges [1]. Flink, et al. [11] concluded in their study that the development of care transitions should involve all professionals, among whom coordination will be required to identify and reconceptualize problems before discharge. Emes, et al. [21] also found the success of the interventions emphasizes the importance of engaging with a wide range of stakeholders when embarking on a process change initiative such as a transitional care plan. For example, the caseworker reached out to outside providers to schedule an appointment before discharge, during which the patient's information was shared.

**Screening Tools to Assist with an Assessment before Developing a Transitional Care Plan**

Patient screening is essential in care, whereby patients' needs, and conditions are assessed for appropriate intervention [2]. The HoNOS scale in this project screens patients for various needs, such as measuring behavior, impairment, symptoms, and social functioning that can affect outcomes after discharge. (Appendix A). The mental health disorders that the HoNOS tool screens for upon discharge determine patients' symptoms severity and identify the appropriate referring outside provider. The HoNOS scale and its excellent interrater reliability and utility remain essential for determining the clinical severity of symptoms among mental health patients [22].

**How a Transitional Care Plan Impact Patient Outcome**

Preventing avoidable readmissions can profoundly improve patients' quality of life and the financial well-being of the healthcare system [13]. Frequent emergency department use and rehospitalizations are indicators of poor access to services or inadequate continuity of care upon discharge [3,7]. While patients, caregivers, and health professionals consider continuity of care an essential feature of high-quality health care. It is crucial to note that effective discharge planning is vital to continuity and integrated care. The inadequacy of discharge planning and unplanned readmissions are closely related and could cause misutilization of hospital services which yields higher costs to the healthcare system [14].

There is also the need for healthcare policymakers and managers to pay closer attention to the requirements of effective discharge planning to prioritize clients' social needs, including food, housing, utilities, and transportation during the transitional period [12,23-25]. The HoNoS scale considered clients' social and economic needs during admission. A transitional care plan process also considers clients' social and economic conditions to make an appropriate and patient-centered transitional care plan and referral to the next level of care.

**Post-Discharge Follow-up**

Patients with mental health conditions have been found to receive fragmented and uncoordinated treatment after discharge [26]. Telephone follow-up calls after discharge has been beneficial during the transitional period, emphasizing the connection of long-term care resources, which is essential for patients to return to and properly integrate into the community [26]. A transitional intervention plan helps to establish a proper connection and integration of patients into the community [27].

**Rationale**

The project consisted of two frameworks, the Orem concept of self-care and the plan, do, study act cycle (PDSA). The nursing theorist concept that guided the project was Dorothea Orem. Dorothea Orem envisioned the self-care deficit nursing theory through acting, guidance, supporting, and providing an environment that promotes personal development about meeting future demands [5]. According to Dorothea Orem's theory, patients have a greater chance of fully recovering if they can retain control over their care [5].

**Assessment**- Orem defines assessment as a direct observation as the patient performs their self-care activities. Assessment of mental health patients' behavior and stimuli are the principal components of data collection which are consistent with the nursing process of assessment, diagnosis, planning, implementation, and evaluation [28]. The staff in the program facility collected data regarding patients' self-care after using the HoNOS scale to determine the patient's needs at admission. Data collected by the team also included patients' health goals in the context of lifestyle, health status, and if they have an available physician to continue their care upon discharge.

**Patient Environment**- Orem describes the patient's environment as a place where they exist, a separate entity in mind Orem. Orem presented several environmental features and classified them physical, chemical, biological, and social. The staff in the program facility engaged in a therapeutic self-care meeting to assist patients and their families in attaining goals toward positive health-related outcomes after discharge.

**Guiding Concept**- Orem defines the guiding concept as helping patients develop coping mechanisms and positive outcomes in responding to stimuli exposure. During the project implementation, staff guided patients during the transition to improve their ability to care for themselves using supportive education and guidance, such as how and when to seek mental health care or attend medication appointments to prevent complications after discharge.

**Supporting**- Orem describes support as ill patients needing education, encouragement, and directing to build self-care abilities. The staff in the program supported patients during the transitional process to identify appropriate providers in the community, scheduled follow-up appointments, and provided patients with other community resources to aid in their recovery.

**Promotion of Personal Development**- Orem describes a person as a physical, social, and psychological character with an inconsistent ability to self-care but has the potential to learn and develop self-care abilities. The staff in the program established an environment that provided direct patient involvement in their discharge process, enhancing the promotion of continuity of care after discharge. The project ensured patients were engaged in the transitional care plan process, which also helped promote personal development and self-advocate. From the concept of nursing in this theory, the staff helped to encourage personal development to reduce the chances of no adherence to post-discharge care through follow-up processes.

The PDSA framework was used in all the stages of the intervention implementation. The PDSA cycle identifies the need for change and provides a consistent, continuous assessment of the implementation of the change process. The project outcome was evaluated by collecting data from the caseworkers in the program facility, which was then presented to the program director and the psychiatrist for continued evaluation and assessment of the project.

The dependent variable is the number of clients who received discharge planning to the next level of care. The independent variables measured in the project included the screening using the HoNOS scale, initial patient meetings, clients' connection with community care providers by scheduling a follow-up appointment before discharge, and a follow-up phone call within the first week of discharge. The data collected were used to find a percentage for each intervention outcome. The outcome measure was the number of patients who received a transitional care plan to the next level of care.

The project leader assumed that caseworkers, the program director, the psychiatrist, and the receptionist would willingly participate in the project implementations in various capacities. These assumptions were based on the idea that team members participate voluntarily, striving for excellence. The project leader assumed, based on the project's approval from the leadership of the program, that the project would have full organizational support. The project leader also assumed there would be an ongoing collaboration between all team members. The proposed intervention in this project can be reproduced in various hospital settings and has proven effective in providing the desired patient outcome after discharge at multiple levels of care [29]. Also, the intervention proposes implementing a follow-up phone call, which should improve patient adherence to the treatment plan post-discharge and allow practitioners to have an additional impact on patient care after leaving the facility.

**Specific Aims**

The quality improvement project's aim was to optimize the transition care process occurring at discharge to increase the percentage of patients who received personalized transitional care plans upon discharge to the next level of care. The problem solved was the low number of clients discharged without a plan. The project site gap was that 37 (31%) out of 121 clients discharged from the mental health program received discharge planning. Also, the caseworkers only provided a list of community providers for patients to self-connect to self-schedule a follow-up appointment to the next level of care after discharge. The primary interventions carried out during the implementation process were (a) The introduction of a discharge checklist, which is a component of the discharge planning process. (b) An appointment to the next level of care before discharge, and (c) A follow-up phone call after discharge supported by evidence to improve the continuum of mental health care and enhance patient outcomes [12,19,23-25]. Post-implementation data analysis demonstrated that implementing a transitional care plan protocol increased the percentage of patients who received a personalized transitional care plan upon discharge to the next level of care.

The project objective was to increase the number of mental health patients who received a transitional care plan. The project implemented an evidence-based [7] transitional care plan protocol to increase the number of patients who received a transitional care plan to the next level of care. Historical data shows clients are admitted over the age of 18, and the average length of their stay in the program is 21 days. The project site's current practice involved the therapist providing a list of providers in the area for patients to self-connect to the next level of care and schedule a follow-up appointment before discharge. Discharge is not the endpoint but one of the multiple transitions within the patient's care journey.

 The project’s purpose was to create a transition of care protocol to be used during discharge planning to the next level of care at the site and fits in the current workflow. To answer the PICOT question: In adult patients enrolled in the Intensive Outpatient Program (IOP), how does implementing a transitional plan of care, compared to current standard practice, impact the number of clients who receive discharge planning to the next level of care in 12 weeks? The number of patients who enrolled in the project was 20% of the 30 new patients admitted during the project implementation phase because the management allowed patients to opt to participate. The project outcome resulted in four out of six patients (66%) receiving transitional care plans and five out of six (83%) receiving a follow-up phone call seven days after discharge.

The literature suggests for best possible transition to the next care level, the patients need to have follow-up appointments before discharge. During the implementation period, the team knew the goal of making appointments before discharge was included to reduce the wait time. Biringer, et al. [30] revealed that discontinuities of care frequently happen as the client transitions from one service to another. Among the numerous barriers in mental health care, the most common are the treatment gaps resulting from inadequate transitional care plans, long wait times, and the lack of accessibility for clients [14].

**Methods**

The project was a Process Improvement (PI) workflow re-designed to increase the number of patients who received a personalized transitional plan upon discharge. The historical data gap analysis called for improving the current transitional protocol because not every patient received discharge planning pre-implementation of the project. The leadership asked for a more structured way of ensuring clients are engaged in the discharge process and to have providers in the community follow up after discharge. The project leader identified the problem and implemented a discharge protocol to increase the number of patients who received a transitional care plan upon discharge. In addition, the project leader examined and changed the current transition care process guidelines to establish an evidenced-based transition protocol to include scheduled appointments prior to discharge and a follow-up phone call after discharge.

**Context**

**The Physical and Sociocultural Makeup of the Local Environment or the Organization**

The project was performed at the not-for-profit organization's intensive outpatient mental health program in the northeastern United States. The project site receives mental health stabilization referrals from inpatient psychiatry and other community agencies. The full program duration is 21 days. The number of referrals determines the outpatient population. The program accepts adults aged 18 years and older. The intensive outpatient program is designed to receive mental health patients from referring agencies such as the department of mental health, outpatient therapists, primary care physicians, inpatient psychiatric providers, social workers, case managers, and school counselors. The program consists of three hours of treatment per day, three to five days per week. The program comprises a combination of supportive counseling, coping skills training, and psychiatry services. Participants also receive daily crisis support services, including the weekends while in the program.

The program has space and services such as group therapy rooms, individual therapist offices, the director's office, the psychiatrists, and two administrative offices housing legal records. New patients were assigned a therapist for daily individualized therapy sessions. The psychiatrist meets with all the patients in the program weekly for check-in and also makes needed medication changes. All patients are scheduled to attend the 9 AM group therapy facilitated by the caseworker 5 days a week.

**The Organizational Structure**

The organization is a top to down hierarchy structure that comprises the executive director, clinical directors, directors of operations, and regional directors. Other staff includes mental health professionals and administrative staff.

Meetings were held weekly with the clinical staff to evaluate the project implementations. It was helpful to receive support from the leadership and the staff. The project leader did not require any financial support to complete the project.

**The Culture of the Organization and Stakeholders**

The mission of the organization is to embrace strengths and acknowledges struggles as each join with youth, families, and communities to promote growth and healing. The organization's work culture includes teamwork with psychological safety, collaboration, communication, and respect among team members. As a result, everyone on the team supported each other and was supportive during the project implementation phase. There were no barriers in the work culture to completing the project. The program's stakeholders are the Department of Children and Families, the department of mental health, the department of education, and 48 local educational entities.

**The Project leader**

The project leader developed (Appendix B), (Appendix C), and (Appendix D) and staff education on the purpose and use of the appendices. The project leader provided leadership for improving the transitional care plan and had a weekly meeting with casework during morning meetings to collect outcome data. The project leader was on site twice weekly to address all questions and concerns the caseworkers may have had. The project leader measured if the interventions were implemented upon receipt of completed and signed (Appendix A), (Appendix B) & (Appendix C) from the caseworkers.

 At the start of the project, the project leader encountered a leadership-requested pause in the first week. The leadership members believed there was a lack of clarity on the project goal, method, objectives, interventions, and expectations. As a result, the project leader was not involved in resolving the issue and was solely handled by the preceptor and the leadership. The primary interventions implemented will help improve patients' well-being and minimize the chance of relapsing and readmission, resulting in a subsequent reduction of patient and organization's financial burden.

**Interventions**

**Project Design**

This was a quality improvement project that used the Plan-Do-Check-Act (PDCA) methodology of quality improvement with Orem's self-care deficit nursing theory as a framework. The cycle is a continuous loop of planning, doing, checking, and acting, which provides a simple and effective approach to solving problems and managing change [31]. The PDCA also defines what to expect, observes closely, compares the actual outcome with the desired effect, standardizes the process, and guides the continuous assessment of the project [31]. Instead of every patient participating in the project, the project director made it optional, which attracted a few patients. Patients who enrolled in the program were given intake paperwork, including the project paperwork, to complete with the assistance of their case worker.

**Project Setting**

The project was carried out in an outpatient, Intensive Treatment Program (IOP) in the northeastern part of the United States, specializing in outpatient treatment for mental health clients upon discharge from an acute or inpatient treatment setting. The current discharge planning approach cannot adequately identify the client's plans and needs after discharge to assist them once they leave the psychiatric treatment program. Upon admission into the treatment program, patients are assigned to a therapist at the project site for daily individualized therapy sessions. In addition, the psychiatrist meets with all the patients in the program for medication management. All patients are scheduled to attend the program five days a week. In addition, patients are also supposed to attend group therapy facilitated by caseworkers daily at 9 AM.

**Population, Inclusion, and Exclusion Criteria**

The program's population was the staff using the checklist and screening tool along with current policies and procedures for admission, treatment protocol, and discharge. The program director administered the project paperwork and notified the learner of new enrollees and upcoming discharges. The caseworkers assisted patients in completing the project paperwork, including the discharge checklist during patients' daily meetings, completed the discharge follow-up phone call, and submitted the completed paperwork to the project leader. Finally, the psychiatrist was part of the transitional planning process regarding evaluations and discharge medications. The secondary population included patients admitted into the intensive outpatient program. The inclusion criteria were all adult patients aged 18 and older. Patients under 17 years were excluded from the project as they are not considered adult patients. The organization required the patients to consent to participate in the project. Therefore, only patients who had agreed to participate were part of the patient population.

**Practice Recommendations**

The project recommends that mental health treatment facilities use transitional care planning screening tools such as the HoNOS scale to balance treatment goals at admission and reality checks at discharge, which could improve the outcome and prognosis of patients with mental health disorders [1]. Implementations- The project goal was to implement a transitional care plan to increase the percentage of patients who received a transitional care plan to the next level of care. Using the PDCA framework, the project developed an aim, and chose an evaluation for each intervention process of the practice change to meet the objective of the transition care interventions, which included (a) an initial HoNOS screening (Appendix A). (b) a patient and staff meeting to initiate the transitional care plan, (c) a discharge checklist (Appendix B) to engage the patient throughout the discharge process, (d) a follow-up appointment to the next level of care before the patient's discharge, and (e) a follow-up phone call (Appendix C) seven days after discharge to discuss how the patient was feeling, whether they had picked up their medications from the pharmacy, reminded them of their follow-up appointment to the next level of care, reiterate what to do during a mental health crisis and answered any questions they may have.

The project leader provided leadership for improving the transitional care plan. It originated from engaging with the caseworkers, the program director, and the psychiatrist during meetings to brainstorm and discuss the structure and process needed to achieve the project's goal. The responsible critical staff included the case workers, psychiatrists, and the project director. The project leader was also on-site twice weekly to provide staff education and guidance to ensure compliance and data collection.

**Plan Phase**

The Planning phase involved the primary cause of the problem of no transitional care plan in the current standard of care. The planning phase included analyzing and developing a PICOT question. This project's PICOT question was In adult patients enrolled in the Intensive Outpatient Program (IOP) (P), how does implementing a transitional plan of care to the next level of care (I), compared to current standard practice (C) impact the percentage of clients who receive discharge planning to the next level of care (O) in 12 weeks (T)? There was no committee formed. All caseworkers, psychiatrists, and the program director have been automatically involved in the implementation of the project. Everything regarding the project was discussed during morning meetings. There was initial staff education before the implementation, which included how to score the HoNOS scale.

**Step-by-Step Implementation Using the Quality Improvement Framework- PDCA Cycle**

**Do Phase-** The Do phase involves the intervention ideas being brought into action. The interventions planned to be carried out in the project included patient screening on admission with the (HoNOS) scale (Appendix A). The Cronbach's alpha has ranged from 0.59 to 0.76 in studies that evaluated the internal consistency of the HoNOS [32]. The HoNOS was implemented as part of the screening tools that have been validated to diagnose and measure behavior, impairment, other symptoms, and clients: social functioning [2], during admission and before being discharged. A psychometric of the HoNOS scale evaluation conducted by Wambua, et al. [33] showed good reliability (r=.74, p < .001) with a Kaiser-Meyer-Olkin measure of sampling adequacy of 0.8, explaining 54.74% of the total variance. HoNOS scale permission letter is on (Appendix E).

The second intervention on day one of admission was an initial meeting with the multidisciplinary transitional care team to initiate the individual patient-centered transitional care plan, and the discharge checklist (Appendix B) was initiated during the first-day meeting. Caseworkers ensure patients have completed copies of the discharge checklist at discharge. The patient-centered transitional care plan was developed for each patient based on their diagnosis, present symptoms, and acute level to identify the appropriate outside provider upon discharge. The discharge checklist contains interventions to address, connection to community mental health providers and resources, an up-to-date medication list, and the date of the next appointment to the next level of care.

The third intervention was to connect patients to community-based providers upon discharge. Patients were connected to their community-based primary care provider or agencies to schedule a follow-up visit to the next level of care by the staff before discharge. The fourth intervention was a follow-up phone call after discharge. The team made a follow-up phone call to clients seven days after discharge, which allowed for questions, misunderstandings, discrepancies in the discharge checklist to be identified and addressed and medication reconciliation. (Appendix C). Patients were given copies of the discharge checklist.

**Check Phase**- The Check phase allowed for evaluating the implemented interventions to increase the number of patients who received a transitional care plan by ensuring the following were implemented: (a) An initial screening, (b) a Patient and staff meeting to initiate the transitional care plan. (c) A discharge checklist to engage the patient throughout the discharge process, (d) A follow-up appointment to the next level of care before the patient's discharge, and (e) A follow-up phone call seven days after discharge. The project leader was on site twice weekly to collect data and attended all team meetings to help answer questions or clarifications as they came up.

Act Phase. The Act phase was where the practice change project results were analyzed for effectiveness. The caseworks showed interest in the continues use of (Appendix B) as it helped guide them through the transitional planning process to preventing missing an intervention. The program director will need upper management's approval to decide if the discharge checklist will be an excellent addition to the current discharge planning process.

**Team Members Involved in the work and their Roles**- All team members participated in the project, including the program director, who administered the project paperwork and notified the learner of new enrollees and upcoming discharges. In addition, the caseworker assisted patients in completing the project paperwork, including the discharge checklist, during their daily meetings. After the discharge follow-up phone call, the caseworkers submitted the completed paperwork to the learner. Finally, the psychiatrist was the project leader's preceptor and also played a role in the transition planning process regarding evaluations and discharge medications. In addition, the project leader had a weekly meeting with casework during morning meetings to collect outcome data such as the client's initial meeting, the client's successful connection to outside agencies or community care providers, and if the staff completed follow-up phone calls within the first week of discharge. The caseworker's completed discharge checklist submitted to the learner proved that the intervention was done.

**Study of Intervention**

The project used a pre-implementation and post-implementation design with a constructive assessment to assess the project-implemented interventions. The data were collected weekly to assess for completion, compliance, and integration of the personalized transitional care protocol into the daily workflow practice. The audit was completed to ensure the necessary adjustments needed to help improve the application of the protocol. The project leader used Excel documents to track data collected weekly and evaluated together with the team, which comprised the program director, preceptor, and caseworkers.

The evaluation plan included using the discharge checklist (Appendix B). The checklist guided patients to ask their caseworkers to engage in the process. The evaluation enabled the project leader to measure the project's accomplishments and effectiveness. The project's intended impact was to increase the number of patients who received a personalized transitional care plan, allow patients to engage in the discharge planning process, and guide patients and caseworkers to track progress and discharge readiness. Another intended impact of the interventions was the follow-up phone call to the patient 7-14 days after discharge.

The intervention was measured and completed when caseworkers submitted copies of the completed and signed discharge checklist to the learner (Appendix B). The program may sustain using the discharge checklist after the project is completed. The significant change was patient engagement, empowerment, and knowledge about the transitional care approach, which was the intended impact. The outcomes were assessed solely from the discharge checklist intervention (Appendix B).

The evaluative measures used in this project were suitable because they measured if patients were at the forefront of their care process. The measures also allowed for easy data collection and enabled assessment for adherence and compliance to the personalized transitional protocol. The checklist was identified to be helpful because it helped remind patients of their follow-up appointments to the next level of care and inquired if patients had picked up their discharge medications and taken them as prescribed. The program already had a discharge planning process in place by giving patients a list to find community providers and self-schedule follow-up appointments before the implementation of the project. The project ensured caseworkers scheduled follow-up appointments with patients' involvement in the process and a follow-up phone call which were not in place in the past.

The impact of the project intervention was assessed by the number of screenings and discharge checklists completed by the caseworkers. The patient engagement in the process was also impactful as the project allowed patients to participate in the discharge process. The unintended outcome was that some participants could not be reached after discharge to evaluate the impact. However, those who were reached were appreciative of the follow-up process. The follow-up phone call after discharge identified that some patients had trouble getting the newly prescribed medications from the pharmacy. The project was found to have made a positive impact by allowing the patient to engage during the discharge process, making it possible to have a post-discharge appointment and a check-in through a telephone call after discharge.

**Measures**

The project design was a pre-implementation and post-post-implementation quality improvement project. The project goal was to implement a transitional care plan to increase the percentage of patients who received a transitional care plan and moved to the next level of care. The project used an Evidence-Based Practice (EBP) screening tool, which was the Health of the Nation Outcome Scales (HoNOS) scale (Appendix A), to screen patients upon admission. A follow-up telephone call was made by the caseworkers and the front desk staff that occurred seven days after discharge. The primary outcome measure was the percentage of patients who received a personalized transition care plan and moved to the next level of care. The elements measured included (a) an initial screening, (b) a patient and staff meeting to initiate the transitional care plan, (c) a discharge checklist to engage the patient throughout the discharge process, (d) a follow-up appointment to the next level of care before the patient's discharge, and (e) a follow-up phone call seven days after discharge.

The data was collected every week for a total of 12 weeks before and after 12 weeks after implementation. The data was then recorded on a Microsoft Excel sheet. The project leader met twice weekly with the team, which comprised the program director, the psychiatrist, and the caseworkers, to check for completion and compliance and examine missing interventions. This helped to identify if the protocol was implemented. A pre-implementation and postimplementation design were administered to assess the knowledge of caseworkers before and after the implementation of the evidence-based project. Post implementation assessment was completed to examine if there was an improvement in how caseworkers completed the discharge process.

An assessment of the data was completed to measure compliance with the personalized transitional care plan. Compliance was measured by a review of the caseworkers' documentation. The project leader also measured if the interventions were implemented upon receipt of a completed and signed Health of the Nation Outcome Scales, Patient Discharge Checklist, and Caseworker Follow-up phone call script (appendices A, B & C) from the caseworkers. Before the implementation, a patient discharge checklist was not in place therefore pre- implementation data was not collected for this activity. The post-implementation discharge checklist assessment was also used to measure if a planned change occurred. The planned change was validated by the data, which found an increase in the percentage of patients who received a personalized transitional care plan upon discharge at the end of the project. The approach was chosen to evaluate if the intervention plan was in place and used part of the transitional care plan developed for each process in the practice change to meet the objective of the transition care interventions.

This project included using data from the HoNOS scale (see Appendix A). As mentioned earlier, Cronbach's alpha has ranged from 0.59 to 0.76 in studies that evaluated the internal consistency of the HoNOS. This demonstrates that there is relatively minimal item redundancy and strong internal consistency, which supports the use of the instrument as a helpful summary of the intensity of symptoms [32]. This shows that the tool utilized in this project is accurate and viable. The HoNOS scale was implemented as part of the screening tools that have been validated as great tools in diagnosing and measuring behavior, impairment, other symptoms, and the client's social functioning [2], during admission and before being discharged. A psychometric of the HoNOS scale evaluation conducted by Wambua, et al. [33] showed good reliability (r= .74, p< .001) with a Kaiser-Meyer-Olkin measure of sampling adequacy of 0.8, explaining 54.74% of the total variance. The caseworkers and the psychiatrist notified all patients that a screening tool would be implemented as a pilot project for quality improvement.

The patients were informed that there are no known risks of participating in the project, period, voluntary participation, and lack of adverse consequences if they participate in the project. Patients were also informed that they could drop out if they changed their minds later not to participate as required by the subject protection method. An additional intervention was to call patients after discharge which measured by the number of follow-up phone calls completed by the staff within the first week of discharge.

Also, the number of follow-up calls helped assess caseworker compliance with the project. The caseworkers were compliant and competent in the implementation of the interventions. The project leader measured if the interventions were implemented upon receipt of completed and signed (Appendix A), (Appendix B) & (Appendix C) from the caseworkers. Compliance was then measured by the percentage of patients who received a transitional plan to the next level of care. There was no pre-implementation checklist already in place, the post-implementation discharge checklist assessment was used to measure if a plan change occurred. The data validated the plan change, which found an increase in the percentage of patients who received a personalized transitional care plan upon discharge to the next level of care at the end of the project.

**Analysis**

Simple descriptive statistics were used to measure nominal data from the results of the transitional plan of care and move to the next level of care which was entered into an Excel sheet. Quantitative methods were used for data analysis to draw inferences from the data collected pre- and post-intervention. Quantitative measures were used when assessing how many (a) initial screenings, (b) patient and staff meetings to initiate the transitional care plan, (c) a discharge checklist to engage the patient throughout the discharge process, (d) a follow-up appointment to the next level of care before the patient's discharge, and (e) a follow-up phone call seven days after discharge. A tally was made, added, and entered on the excel sheet.

The project leader measured the interventions that were implemented upon receipt of the completed and signed Health of the Nation Outcome Scales, Patient Discharge Checklist, and the Caseworker Follow-up phone call script (appendices A, B & C) from the caseworkers. In addition, the measure was the number of transitional care plans developed and implemented by the caseworkers. The caseworkers have all attained their master's degrees in social work and incorporate the knowledge and skills necessary for the performance of the role of caring for mental health patients. After reviewing the data collected, the project leader established that the compliance rate was improved. The project leader also discovered that the project helped to increase the number of personalized transitional care plans issued after discharge.

**Ethical Considerations**

The project received IRB approval upon determining that the project did not meet the federal regulation's definition of human subject research. Therefore, IRB review and oversight were not needed in the project implementation. The project's approval letter is on (Appendix F). The project leader also completed the Collaborative Institutional Training Initiative (CITI) certificate to obtain approval from the Capella university and Internal Review Board (IRB). Before starting the project, the project leader ensured that any potential risk to human subjects was eliminated. Potential risks entailed the probability of injury or harm, which may be physical, psychological, social, economic, or legal, that could occur due to participating project. Patients were also notified, before participation, that they could voluntarily drop out at any time. Participants were made aware of the project's duration. The project leader was on site to address all questions and concerns that the caseworkers may have had. The caseworkers deleted or deidentified all individually identifiable information in the data collection.

The hipaa privacy rule and the Belmont principles, such as respect for person, beneficence, and justice, were followed. The hipaa privacy rule provides conditions for protecting Protected Health Information (PHI) during the project implementation process. In the project, compliance with hipaa ensured that patients' privacy was protected, eliminated access to patients' PHI data, and no storage of patient information to prevent access by unauthorized third parties. The approach utilized by the project leader to safeguard Personal Information Identifiable (PHI) was to collect only data anonymized by removing and deleting personal identifiers by caseworkers before providing the data to the project leader. Per the IRB data destruction policy, data collected must be kept for 7 years after the completion of the project and will be destroyed by 2029.

**Results**

The primary outcome measure was the percentage of patients who received a personalized transitional care plan and were discharged to the next level of care. Before the quality improvement project was started, the percentage of patients who received a transitional care plan and were discharged to the next level of care was 31%, and after the quality improvement project, the patients who received a personalized transitional care plan and discharged to the next level of care was 66%. This shows that the objective of the project was met because there was a 35% increase in the percentage of patients who were discharged to the next level of care that received transitional care plans increased after the project was executed. The finding would imply that the transitional care protocol had a positive effect on the number of patients who were discharged with a plan.

 All six participants (100%) had outside providers, while four out of six participants (66%) received a transitional care plan upon discharge, two out of the six participants (34%) did not complete a discharge process because one patient was self-discharged, and the other did not have their therapist in to complete the discharge protocol. Five out of six (83%) received follow-up phone calls, while one out of the six participants (17%) could not be contacted for follow-up.

(Table 1) shows, the number of patients who received personalized transitional care plans and were discharged to the next level of care and follow-up phone calls pre-implementation and post-implementation. In conclusion, the percentage of patients who were discharged to the next level of care increased per the objective of the project. However, there was no pre-implementation data for follow-up telephone calls.

|  |  |  |  |
| --- | --- | --- | --- |
| Measure | % Pre-Implementation | % Post-Implementation | Difference |
| Discharge Planning to the next level of care | 31% (=127) | 66% (=6) | 35% increase |
| A follow-up phone call | 0 | 83 | 83 |

**Table 1:** Pre-Post Comparison of Outcomes- Measured after the implementation of interventions.

The 12-week project implementation showed a relationship between the use of a transitional care plan and no transitional care plan for patients with a mental health disorder because there was an increase in the percentage of patients who received a transitional care plan upon discharge. The approach chosen to evaluate the intervention plan was quantitative outcome metrics, which were part of the transitional care plan process and practice change to meet the objective. The measures were (a) an initial screening, (b) a patient and staff meeting to initiate the transitional care plan (c) a discharge checklist to engage the patient and to guide caseworkers throughout the discharge process, (d) a follow-up appointment to the next level of care before the patient's discharge, and (e) a follow-up phone call seven days after discharge.

The caseworkers were compliant and competent in the implementation of the interventions. Compliance was measured by a review of the six patient’s medical records for those who received a transitional plan upon discharge. The Project leader measured if the interventions were implemented upon receipt of completed and signed Health of the Nation Outcome Scales (Appendix A), Patient Discharge Checklist (Appendix B), and the Caseworker Follow-up phone call script (Appendix C) from the caseworkers. Compliance was measured by the number of patients who received a transitional plan upon discharge to the next level of care.

The project had a positive patient outcome of 4 out of 6 patients (66%) receiving a transitional care plan, and 5 out of 6 patients (83%) of patients received a follow-up phone call after discharge. There were no unintended consequences associated with the project implementation. However, some participants could not be reached after discharge to evaluate the impact. A patient self-discharged before the completion of the project. Participants who were reached were appreciative of the follow-up process. The follow-up phone call after discharge identified that some participants had trouble getting their discharge medication from the pharmacy.

The results of this project are consistent with a study by Li, et al. [29], who identified that a transitional care plan offered by an interdisciplinary team showcased great success in improving the transitional care protocol. The continuation of the intervention by the facility would help increase the number of patients who receive personalized transitional care plans upon discharge to reduce readmissions, improve the quality of care, and reduce the costs of readmission in the future. The interventions were implemented as planned, and the outcome was as expected since the transitional care plan did aid in improving the current discharge planning process to increase the number of patients who received transitional care plans upon discharge.

The project brought awareness to aspects that must be considered when considering a discharge care plan protocol. More complete results would have been obtained if the sample of the participants were larger. The success of the interventions highlights the importance of engaging with an interdisciplinary team when undertaking a process change initiative. It also shows the value of applying an interdisciplinary approach when tackling complex problems. There were no records of missing data. Further study is required to investigate why patients are hesitant to follow up with their providers upon discharge.

**Discussion**

This section focuses primarily on summarizing the essential findings and their relevance to the rationale and specific aims. It also discussed the strengths of the project.

**Summary**

The aim of the quality improvement project was to implement a transition care process occurring at discharge to increase the percentage of patients who received transitional care plans upon discharge to the next level of care. The project was successful as there was an increase in the number of patients who received a personalized transitional care plan upon discharge after the project's completion. Before the quality improvement project was started, the percentage of patients who received a transitional care plan was 31%, and at the completion of the quality improvement project, the patients who received a personalized transitional care plan was 66%, and 83% received a telephone call after discharge. This shows that the objective of the project was met as a result of implementing the transitional care process occurring at discharge. The aim of increasing the number of patients who receive a personalized transitional care plan to the next level of care was achieved.

The strengths of the project were the use of a discharge checklist to empower and engage with patients during the discharge process. The checklist was also used by caseworkers as a guide in the transitional care protocol process to ensure no intervention was missed. The follow-up phone call after discharge from the program was also a strength that was not in place prior to the implementation of the project. Patient involvement was a crucial benefit in this project, resulting in increased adherence to the plan, which contributed significantly to improving patient outcomes noted upon the follow-up telephone call. While some patients had already called to confirm their appointment after discharge, others had already followed up on the next level of care noted during the caseworker's telephone call. A patient was found to have issues with the newly prescribed medication when trying to pick it up from the pharmacy upon discharge. This was also noted during the telephone phone call. The psychiatrist was contacted to resolve the issue. Patients who had an appointment before discharge were more likely to attend outpatient services within 30 days of discharge [29]. The project outcome was achieved. Its success resulted from the multidisciplinary team members, the caseworkers, the program director, and the psychiatrist.

**Interpretation**

The primary outcome was to increase the number of patients who received a personalized transitional care plan upon discharge. This was established by implementing a transitional care protocol for the intensive outpatient mental health treatment program facility over 12 weeks, with an increase in the number of patients who received a personalized transitional care plan upon discharge. There was a clear association between implementing a transitional care plan intervention and the measured outcome. Patients who received the care plan received a follow-up appointment before discharge and a follow-up phone call after discharge, indicating that patients who received the care plan followed up to the next level of care to prevent a treatment gap. The results of this project are consistent with Li, et al. [29], who identified that a transitional care plan offered by an interdisciplinary team showcased great success in improving patient outcomes upon discharge agreed to this project.

The project has the potential to continue to increase the number of patients who receive a transitional care plan upon discharge. The interventions were implemented as planned, and the expected outcome was achieved. A more comprehensive results would have been obtained if the sample were larger, bring about better healthcare plans for the mental health setting The project recommends that mental health treatment facilities use transitional care planning tools to balance treatment goals at admission and reality checks at the time of discharge, which can improve the outcome of patients with mental illness. The discharge process should be started at admission for every patient who enrolls in the program. Patient screening is essential in assessing care and identifying the appropriate intervention [2]. The HoNOS scale remains an essential tool for determining the clinical severity of symptoms among mental health patients [22].

 The findings of this project and the suggestions by Tyler, et al. [4] in their study were to improve the quality of information upon admission to facilitate and accelerate the discharge process. Establishing such a program will incur little to no additional cost to improve the discharge planning process by including a patient discharge checklist and a follow-up phone call during and after discharge. The benefits of an effective transitional care plan far surpass the cost of implementation.

**Limitations**

One of the limitations of the project implementation was the short period of time of 12 weeks which was not enough to affect a practice change. The issue of medical literacy can be significant in the mental health population and further clarification to identify the correct symptoms during the initial HoNOS screening may be needed. The caseload of caseworkers did not allow them to have enough time to explain things to the participants in detail during the initial screening. Mental health patients' mood typically switches by day, affecting the nature of their responses, resulting in a limitation in the project's internal validity. Another significant limitation was the small sample size which affected the generalizability of the project's results and probably affected the internal validity. One of the caseworkers was also resistant to the project implementations and discharged a patient without following the transitional care plan protocol. With continued coaching and support, the frontline staff learned to appreciate the transitional care plan process and its implementations. The project leader attempted to minimize the limitations by seeking assistance from the program director, who ensured all caseworkers were implementing the protocol. Lastly, the project leader found that continued listening and conversing with the caseworkers helped overcome some challenges and limitations. The critical lesson the learner learned was that change needed a process, structure, and interdisciplinary team relationship approach to be successful.

**Conclusion**

Discharge planning offers one of the best opportunities for person-centered transition planning, even in other contexts, since the likelihood of patients following up with their outpatient providers was related to the level of engagement, preventing gaps in treatment. The purpose of the quality improvement project was to implement a transition care plan protocol for discharge preparation to increase the percentage of patients who received transitional care plans upon discharge to the next level of care. The project was successful as there was an increase in the number of patients who received a personalized transitional care plan upon discharge after the project's completion. Before the quality improvement project was started, the percentage of patients who received a transitional care plan was 31%, and after the quality improvement project, the patients who received a personalized transitional care plan was 66%, and 83% received a telephone call after discharge.

The implementation of the project helped bridge the treatment gap by ensuring patients had an outsider provider, had appointments scheduled and received a follow-up phone call 7 days after discharge. A transitional plan of care has showcased consistency in improving patient outcomes in this project and from conclusions of other extant literature mentioned in this paper. Several considerations and challenges remain with the growing body of research in the continuum of care for mental health patients and the pressing need for sufficient discharge planning upon discharge. This project could spread to different contexts to ensure all patients receive a transitional care plan upon discharge. The intervention included patients' engagement in the transitional care plan process, which can be a further implication for practice for further study. The project leader found out during the project implementation that most patients tend to self-discharge from the program before the discharge date. The project suggests further research be conducted to determine why some mental health patients in the program tend to self-discharge without a transitional care plan. The success of this project and positive feedback from the staff and patients exemplifies the effectiveness of providing a personalized transitional care plan.

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