IMPROVING DRUG COURT OPERATIONS: NIATX ORGANIZATIONAL IMPROVEMENT MODEL

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[8] Applying NIATx to Drug Courts—The NIATx (Network for the Improvement of Addiction Treatment) performance improvement model was used to increase client access to and engagement in Drug Court services.

[9] Improving Participant Flow in Drug Courts—The NIATx performance improvement model reduced wait times, increased admissions rates, and reduced no-show rates in nine Drug Courts.

[10] Achieving Best Practices in Drug Courts—The NIATx performance improvement model shows promise for helping Drug Courts implement organizational changes to adopt best practices.

BY UNITING JUSTICE with rehabilitation for substanceabusing offenders, Drug Courts introduced an important innovation to the court system. The expansion of the adjudication role and allowing judges to divert offenders from prison created a new paradigm. The use of criminal justice and social services in tandem (i.e., a carrot and stick approach) is widely accepted, and the Drug Court movement has achieved considerable recognition; however, to succeed, Drug Courts have had to respond to the challenge of integrating disparate criminal justice and treatment system components, each with individual concerns and philosophies regarding public safety missions, individual rights, and personal growth. While the Drug Court movement has consistently reported positive outcomes (Marlowe, 2010), offering substance abuse treatment as an alternative to incarceration requires substantial integration and management of organizational processes for each Drug Court—administrative practices that create barriers to treatment, duplication of efforts, and long wait times for treatment.

Each Drug Court's success corresponds with how well it addresses these operational challenges.

This article reports on a program in which NIATx (Network for the Improvement of Addiction Treatment) with assistance from the National Development & Research Institutes (NDRI) provided technical assistance for adult treatment Drug Courts that received grant awards from the Center for Substance Abuse Treatment (CSAT) in 2009. The program goal was to improve Drug Court operations that increase client access to and engagement in Drug Court services, thereby increasing recovery and reducing recidivism. The organizational improvement model that NIATx developed has been highly successful in improving the functioning of substance abuse treatment programs (McCarty et al., 2007; Hoffman et al., 2008). The present program applied these same techniques to improve access and engagement in Drug Courts.

ABOUT NIATX

Founded in 2003, NIATx works with behavioral health organizations to help them get more people into treatment and *keep* them in treatment long enough to experience the benefits of recovery. The NIATx model was developed in response to two national initiatives: Paths to Recovery, funded by the Robert Wood Johnson Foundation (RWJF), and Strengthening Treatment Access and Retention (STAR), funded by CSAT. The thirty-nine substance abuse treatment organizations that participated in the first initiatives used a simple process-improvement model to change the business practices and reduce administrative barriers to treatment that impeded their ability to deliver quality care (Cappocia et al., 2007).

NIATx Areas Of Application

The original NIATx projects generated a strong body of knowledge about how substance abuse treatment organizations could improve the quality of addiction treatment. NIATx has worked with nearly 3,000 behavioral health organizations around the country, most of whom are health care providers treating persons suffering from

substance use, mental health disorders, or both (McCarty et al., 2007; Hoffman et al., 2008). Within substance abuse treatment, the NIATx model has demonstrated success in all aspects of care, from screening and brief intervention to medically managed intensive residential treatment and therapeutic communities. NIATx has organized learning collaboratives (Kilo, 1998) for provider agencies working to improve outcomes for pregnant and postpartum women, adolescent substance abusers, those at risk for or suffering from HIV/AIDS, opioid abusers, cultural minorities (such as African–Americans and Latinos), and many other targeted treatment programs.

Calls for organizational and systems improvement to increase treatment access and quality within criminal justice settings have been growing (Heck & Thanner, 2006; McCarty & Chandler, 2009). Applications of the NIATx model have helped organizations to reduce their paperwork burden, increase recovery services for persons who have completed treatment, or adopt evidence-based practices such as medication-assisted treatment. Adopting a NIATx approach within Drug Courts offers an excellent opportunity to identify and remove process barriers in both the treatment and justice systems that impede the ability of substance abusers to achieve and maintain recovery.

The NIATx Model

As a starting place, the NIATx model of process improvement leads organizations or programs to focus upon four aims that address client access to and continuation in substance abuse treatment:

- Reduce wait time to treatment
- Reduce no-shows
- Increase admissions
- Increase continuation in treatment

To create improvement in these four aims, the NIATx model stresses five principles for successful organizational change (Gustafson & Hundt, 1995):

- Understand and involve the customer (the offender, or participant, in the case of Drug Courts)
- Fix key problems

- Pick a powerful change leader
- Get ideas from outside the organization or field
- Use rapid-cycle testing

In addition to these five principles, bringing management and staff together to work in an integrated manner is central to the NIATx model (McCarty et al., 2007). Support from a senior leader (the executive sponsor) is essential for a quality improvement project to succeed. The executive sponsor is usually the director or CEO of an organization or, in the case of Drug Courts, a judge. This person becomes responsible for authorizing the time and resources needed to complete the project successfully. The executive sponsor also designates a staff member as the change leader to manage the organizational improvement process that addresses one of the four aims. Together, the executive sponsor and the change leader agree to establish a change project—a process improvement initiative that sequentially targets one NIATx aim at one location with one population. The change leader, who is responsible for organizing and conducting the project, together with the executive sponsor, assembles a change team, which includes a short list of staff members from their Drug Court system. The change team measures baseline data, selects change ideas to test, implements and monitors the change, determines its impact, and reports the results.

The change team uses process improvement tools to identify and address organizational structural or system issues that interfere with or inhibit clients from accessing and continuing in treatment. Two fundamental tools are the walk-through and rapid-cycle testing using the plan-do-study-act (PDSA) cycle.

Walk-Through—This is the primary method of identifying potential targets for change. Staff members take on the role of a client needing treatment to experience the process as a participant would. Taking this view of Drug Court and treatment services—from arrest or first contact, through intake, screening, assessment, and admission, to final discharge or graduation—helps staff members to understand problems from the participant's perspective. Simultaneously, staff members involved with the process are asked to provide a candid description of their observations and experience. Input from participants

and from those who serve them helps the change team to prioritize areas that need work to achieve their change project goal.

Rapid Cycle Testing—After using the walk-through observations and feedback to identify areas for change, the change team (which should have an appointed data coordinator) relies on the PDSA cycle to turn a change idea into action. The PDSA cycle represents the sequential flow of information gathering, decision making, action, and assessment. Critical to change team success is doing a series of short rapid cycles, with each cycle—from planning through implementation—taking only two weeks. This allows the change team to assess quickly whether the new idea is leading them toward the intended improvement and to make decisions about what next steps should be. The team adopts the change as a new standard of operation only when it has been demonstrated to be an improvement through comparison of baseline and follow-up observations (for example, reducing time from first contact to assessment from eight days to two days).

The process of measuring change is very important and should speed the improvement process rather than delay it. By collecting just enough consistent data before, during, and after each change, teams measure progress with respect to the goals they set and provide information for evaluating a change's impact. Often in the PDSA change process, it is easier to rely on manual data collection for quick and rapid feedback on the success of the change. This means relying on small samples collected over short time periods to measure change progress.

Using this method of testing changes, the NIATx model (1) minimizes risks and expenditures of time and money because changes are not implemented systemwide until effectiveness is demonstrated; (2) reduces disruption to participants and staff in making changes; (3) lessens resistance to change by starting on a small scale; and (4) learns from the ideas that work as well as from those that do not. By starting with small changes to test ideas quickly and easily and by using simple, pragmatic measurements to monitor the effect of changes over time, the PDSA model can lead to larger improvements through successive quick cycles of change.

The NIATx Learning Collaborative

To foster the adoption and implementation of the process improvement model and expedite the sharing of innovations, NIATx organizes learning collaboratives that involve a variety of activities and services intended to facilitate the formation of a learning community for adult learning and provide practice in using the NIATx model, including the following:

- Learning Sessions—Change teams convene at single- or multiday workshops to learn from each other and outside experts.
- Conference Calls—Teleconference calls and webinars are held. generally monthly, during which change leaders discuss issues and share progress on their change projects.
- Coaching—An expert in process improvement works with a change team to help it make, sustain, and spread process improvement.
- NIATx Web Site—A storehouse of process improvement tools, promising practices, and success stories, this Web (www.niatx.net) provides complete instructions on how to conduct a NIATx change project.

IMPLEMENTATION

CSAT funded grants to forty-four Drug Court treatment projects in 2009 (Substance Abuse & Mental Health Services Administration (SAMHSA), 2009). These grantees were invited to participate in the program to focus on access and engagement improvement efforts during 2010. Ten Drug Courts were chosen to participate in the NIATx Learning Collaborative for Adult Treatment Drug Courts to improve client access to and retention in Drug Courts. The ten courts represented diverse geography (East Coast, West Coast, Midwest, South,) urban and rural settings, ranges in size, different types of Drug Courts (tribal, family, prison diversion, etc.), and varying stages of maturation (less than two years of court existence to more than twenty years).

NIATx Technical Assistance

The approach with the ten Drug Courts followed the NIATx learning collaborative model described above. The first step toward participation in the NIATx learning collaborative for each Drug Court was to conduct a walk-through prior to any coaching or in-person training. Based on their walk-through findings and exploratory baseline measures, each Drug Court considered an aim, formed change teams, and delegated executive sponsor and change leader roles prior to attending the first of three learning sessions.

Two to three members of each Drug Court's change team attended the first learning session, a kickoff meeting that included training in the NIATx process improvement model and tools for change team success, establishing goals for their change project from the four NIATx aims, and creating a project charter. Subsequent learning sessions, held six months and one year after the kickoff, focused on peer networking and sharing lessons learned and success stories so that Drug Courts could learn from each other and from expert NIATx coaches in person.

Each site received additional assistance in the form of coaching via monthly technical-assistance telephone calls and a one-day site visit. Coaching support helped Drug Courts select personnel for change teams, utilize process improvement tools to identify change barriers (flow charts, fish-bone diagrams, etc.), select improvements to test (nominal group technique, etc.), monitor change data (spreadsheets, graphs, etc.), and communicate the results (storytelling, etc.). Each month, NIATx conducted a conference call or webinar for members of the ten change teams, which offered continued training and provided a forum for the teams to share their experiences in applying process improvement in Drug Court settings.

Over the course of one year, change teams implemented test changes through PDSA cycles progressively until they had achieved their target improvement, lost momentum on an aim, or identified a higher priority aim to address. At the third and final learning session, nine of the ten original Drug Courts¹ came together to report their progress and exchange ideas on the success of their process improvement projects.

IMPROVEMENTS IN COURT OPERATIONS

Over the course of the 12-month collaborative, eight Drug Courts worked on reducing the wait time to treatment, two Drug Courts targeted reducing no-shows to appointments, and four Drug Courts targeted increasing admissions.

Each Drug Court self-reported its change project results to its collaborative peers at the final learning session in short presentations consisting of essential information that summarized the data they used to monitor and measure the effectiveness of their NIATx change efforts, what process they changed, and how.

Wait Time Reductions

The eight Drug Courts that focused on wait times conducted eleven change projects targeting the steps in the client flow. These courts achieved a median reduction of 57% in client wait time. The time it takes participants to traverse the steps from arrest to receiving addiction counseling is often influenced by inefficient business, bureaucratic, or administrative practices and policies. Wait time reduction improvements adopted by these Drug Courts fell into three general categories: scheduling modifications, paperwork revisions, and inclusive communications.

Scheduling Changes

Some Drug Courts improved wait times by modifying their scheduling practices. One court's change team concentrated on the treatment agency's process of scheduling admissions appointments. Traditionally participants had to contact the counselor, who would then offer an appointment slot according to his or her availability. Al-

¹ One of the original ten courts dropped out because of internal administrative issues but expressed interest in continuing with the NIATx process after the issues were resolved.

ternatively, the agency adopted an open-clinic scheduling method where participants needed only to contact the agency front-office staff for the next available appointment slot; counselors were assigned when the participants arrived for their appointment. This scheduling method produced an 84% reduction in wait time for participants between the orientation session and an admissions appointment, decreasing from an average of over twelve days to around two days.

A second Drug Court's change team addressed the elapsed time between screening for Drug Court and admission thereto. Their change team initially found that an unsatisfactory number of clients were being held over each week for a decision on admission. They PDSA-tested a different scheduling process wherein the daily docket for the court team began one-half hour before other Drug Court activity, thereby reducing distractions. This practice created a better environment for Drug Court staff to communicate about clients that resulted in thirty-seven and fifteen fewer days between screening and admission for preadjudication and postadjudication participants, respectively.

A third Drug Court reduced wait times by implementing a centralized electronic scheduling program coupled with the reassignment of participant scheduling responsibility away from counselors and onto the treatment facility administrative support staff. The Drug Court also changed the practice of having participants return for treatment the following Monday to having participants report for the next available session, sometimes resulting in same-day treatment, thereby considerably reducing wait times.

Paperwork Revisions

Drug Courts also improved wait times through paperwork reduction. One Drug Court's efforts reduced the time required for a Drug Court referral to be assessed for treatment from twenty-eight days to twelve days by developing an improved flow of referral paperwork between other criminal court divisions and the Drug Court team. They did this through the addition of an inbox in the courthouse specifically for Drug Court orders and by sharing new participant information among all Drug Court team members using a tracking spreadsheet.

However, while the improved wait times increased efficiency between referral and assessment, doing so created a new problem: it increased time between a participant's completed assessment and admission to treatment by 140%. The wait times between assessment and treatment grew from twenty-five days to as many as sixty, providing a lesson regarding the interdependence of many of the processes involved in getting participants into treatment. As part of the continuous improvement process, the change team then turned its attention to overcoming this new bottleneck.

Another Drug Court that implemented a paperwork change project improved wait times by changing the paperwork requirements, including the revision of a standard screening form to a simplified checklist that reduced the narrative obligation and included the date of referral. By including the date, the staffing team became more aware of the elapse of time to sentencing and allowed them to prioritize cases accordingly.

Inclusive Communication

Drug Courts also pursued reducing wait times by setting up more inclusive communication practices. One Drug Court did this by including a partner agency staff person in case management efforts. The court implemented a monthly clinical case staffing between treatment staff, Drug Court coordinators, and court staff to coordinate discharges, new admissions, and directly monitor capacity.

Another Drug Court, where participants waited on average sixty-two days for treatment assessment and placement, addressed this by increasing informal communications between the court staff and the health center. The Drug Court instituted a standard 30-day maximum wait. Communication between the court coordinator and treatment counselors increased, and they concentrated on efficiently assigning appointments, resulting in an average wait time of only ten days.

Admissions Increases

Four Drug Courts tested ways to improve their admission or referral totals. For three of these courts, monthly average admissions to Drug Court treatment increased sharply to almost double (92%–100%) and the fourth court showed a fourfold increase in referrals owing to their very low baseline. Change team interventions that were effective for increasing admissions included staff placement and outreach

Staff Placement

To boost their enrollment totals, the change teams of three courts placed a Drug Court coordinator on-site at the courthouse on the day of hearings to meet with new clients and their families to increase the rate of new admissions.

Outreach

Another court conducted substantial outreach and education about Drug Court with social workers at a partner referral agency to increase admissions to the court. The Drug Court ran successive change cycles that included developing a newsletter, conducting in-person meetings between court and referral agency personnel to build understanding and strengthen relationships, and rerouting referrals from the public defender's office to the jail social workers so that Drug Court staff received earlier notice.

Reductions in No-Show Rates

Reductions in no-show rates and related increases in program participation were accomplished by change team interventions including reminder calls, escorting participants, and reporting attendance to the Drug Court.

Reminder Calls

One Drug Court with a failure rate of 41% for participant appearances at scheduled orientation appointments was able to reduce that to 18% by making reminder phone calls to the participant the day prior to their appointment.

Escorting Participants and Reporting Attendance

Another Drug Court focused on participants' attendance at a 2-day pretreatment group with baseline attendance rates of 62 percent. After several PDSA cycles, they adopted changes that included escorting participants to the classroom and reporting attendance directly to the Drug Court. The rate of participant attendance improved to 76 percent.

Synergistic Improvement Effects

Drug Courts that achieved improvements on one aim realized improvements on other measures. For example, a Drug Court that produced a seven-day reduction in wait time by making intakes available on the same day the participant called for an appointment found a concomitant 35% increase in their intake completion.

DISCUSSION

The project described in this article represents a first step in applying the NIATx model to achieve organizational improvement best practices in the Drug Court environment. NIATx offers a method to pair systematic experimentation with innovation until it can be fully adopted in the court. Through participation in the learning collaborative and applying the NIATx process improvement model, the adult treatment Drug Courts improved organizational and administrative processes in their programs that reduced wait times and no-shows and increased admissions and participant engagement with treatment. These improvement projects provided courts of different models, sizes, populations, and geographies substantial gains in performance, experience, and training in the application of process improvement tools and organizational change for continued growth. At the final learning session, each of the Drug Courts reported that changes they had developed during this project had become standard procedure.

The Drug Court community appears especially interested in exploring and adopting best practices to improve their operations and outcomes. In a system focused on rehabilitation and accountability, strengthening offender adherence at each step, from monitoring ap-

pearances through treatment participation, imparts considerable value. During walk-through and change team discussions, a number of courts reported that delaying treatment hindered operations and interfered with the offender's recovery. The participating Drug Courts demonstrated the capacity of the NIATx model to facilitate organizational improvements such as timeliness of services in complex Drug Court environments. The NIATx approach has proved an effective practice in the participating Drug Courts and is a promising best practice for Drug Courts that face similar challenges.

Next Steps

Increasingly, Drug Courts and treatment programs serving criminal justice populations are requesting training and tools to implement process improvement. In addition to a wide array of free guides, tools, and other resources, NIATx regularly offers free webinars on current topics of interest as well as continuing education in NIATx implementation (available online at www.niatx.net). Several state and national Drug Court professional associations have hosted NIATx training workshops at annual meetings. NIATx continues to develop a pool of expert coaches, to maintain a roster of NIATx-experienced peer mentors within Drug Courts to support process improvement efforts in criminal justice, and to serve future collaborative efforts for the field.

New Directions

Research is needed to evaluate the longer-term impact of NIATx-facilitated changes and enhanced communication among Drug Court participants. The improved client flow within participating Drug Courts demonstrates the positive organizational effects of the NIATx-related changes, which may in turn improve participant recovery and recidivism. Considerable evidence supports the effectiveness of Drug Courts. A next step is to explore how organizational functioning influences outcomes. Proving the value of improved organizational effectiveness for participants would be especially beneficial.

The experiences of the Drug Courts that participated in the *NIATx* Learning Collaborative for Adult Treatment Drug Courts program of-

fer information and guidance to other court systems seeking operational changes to improve service coordination and delivery. Applying NIATx process improvement practices can help overcome resistance to organizational change and resolve operational issues that hinder the delivery of effective services. The lessons learned from this project confirm that the NIATx organizational change model offers a highly promising practice for improving the efficiency and success of Drug Court systems.

Points of view, opinions, and conclusions in this paper do not necessarily reflect those of the U.S. Department of Health & Human Services (DHHS), Substance Abuse and Mental Health Administration (SAMHSA), Center for Substance Abuse Services (CSAT), NIATx, or NDRI.

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