Evaluation of
Cumberland County DUI and Drug Court

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2009-2012

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Executive Summary

This report summarizes analyses of all available data for the Cumberland County Adult Drug Court Program. Analyses are based on data drawn from information collected for clinical and reporting purposes from July 1, 2009 through June 30, 2012. During the three-year period a total of 55 individuals were admitted to the program over the three years of the operation of the court with BJA funding.

All of the participating drug court programs are based on a standard problem solving model court. In addition to judicial supervision; participants receive a variety of services including substance abuse, mental health, educational, and family support services. All services were coordinated through and supervised by the drug court teams.

Results for the participants were very positive. Of the 55 adults for whom intake interviews were conducted, 53.3% graduated successfully. Participants showed improvements on all outcome measures. In terms of recidivism at the time of the evaluation study, program participants had a 91.0% rate of remaining arrest and conviction free at one-year and 91% at two-years. Substance use also appeared to have declined significantly. Of the four thousand and fifty-four drug tests administered to program participants; 98.4% showed no evidence of substance use.

The results of the evaluation suggest that the project has been successful in reducing continued criminal activity and substance use, and had done so at a rate in excess of alternative programs. The results also suggest that the individuals who have successfully completed the program have reintegrated into the community at a level that is producing an effective protective factor to guard against future recidivism and improving psycho-social outcomes.
This document presents the results of an evaluation of the Upper Cumberland Adult DUI and Drug Court. Cumberland County is a small county of approximately 50,000 residents located in a rural area of Middle Tennessee. Like many rural areas, the drug court faces serious challenges related to the lack of available resources. While excellent inpatient and residential treatment are available in surrounding communities; outpatient treatment services were not available locally. Therefore, BJA funding was utilized to develop an outpatient treatment program that would be available for drug court participants. Outpatient services were put in place to enhance existing case management, supervision, and drug-testing strategies. The new services were organized around three evidence-based interventions: Moral Reconation Therapy (MRT); MME (Motivational, Educational, and Experiential) Journaling System; and the Matrix Model. To meet the need for a credible assessment and assure that participants are placed at the appropriate treatment levels and in the most individually-suited programs, the court also adopted a series of ASAM-based assessment tools. The community and local stakeholders were very supportive of the expanded project. The expanded ability to provide evidence-based interventions, via MRT training, was an important new resource for the community. The project was also able to expand other recovery resources through the establishment of new NA meetings at times and locations that were accessible for participants.

The ultimate goal of these service expansions was to provide evidence-based treatment that is integrated with more efficient and cost-effective procedures for supervision, drug testing, and case management. This integrated treatment model was tailored to the needs of a court with a small staff in a community with few available resources. All of its elements need to be carefully analyzed in terms of cost and program effectiveness and adjusted as needed in order to assure the best possible outcomes for our participants at the least cost possible. To this end, the stated goals of the court are:

1) increased levels of community safety
2) enhanced participant well-being
3) improved participant social functioning
4) high levels of participant program participation.

Background on Drug Courts

There are currently more than 2.2 million incarcerated individuals in the United States, almost all of whom will return to the community (BJS, 2011). There are clear links between incarceration and substance use; as an estimated eighty percent of incarcerated individuals have serious substance abuse problems (CDC, 2001). Individuals charged specifically with drug offenses constitute the majority of federal prisoners (51%), and a significant proportion of state prisoners nationwide (18%) (Guerino, Harrison and Sabol, 2011). Additionally, significant proportions of state prisoners (19%) and federal inmates (16%) reported committing their current offense to obtain money for drugs (Mumola and Karberg, 2006). Unfortunately despite incarceration, most individuals who are released to the community return to prison within a short period of time.
While recidivism rates vary widely by state, within three years, almost half (43.3% to 45.4%) of all prisoners nationwide return to prison (Pew Center on the States, 2011). Recidivism rates in the state of Tennessee, the site of the study, are even higher. Three-year recidivism rates in Tennessee are 46.1%, and four-year rates are 54.8% (TDOC, 2010). The financial cost of incarceration is significant, particularly for state governments. Nationwide, the estimated cost of a year of state incarceration is $26,000 per person (Schmitt, Warner, and Gupta, 2010). Last year, alone, states collectively spent over fifty-one billion dollars on corrections (NASBO, 2011).

To combat these issues, specialized courts, or drug courts, have emerged in many communities to provide an alternative to repeated incarcerations for substance dependent individuals. The concept combines substance abuse treatment and the authority and structure of the court system to provide an alternative to the revolving door of continued incarcerations for substance dependent individuals. Typically, drug courts work with the court system, community corrections, and community-based substance abuse treatment providers to provide sustained monitoring and consequences for relapse to ensure that individuals engage in, and benefit from, community-based substance abuse treatment.

The National Association of Drug Court Professionals suggest that all drug courts share these common characteristics: provision of a minimum of a year of contact during which participants are provided with substance abuse treatment and other services; high levels of personal accountability; regular and random drug tests; frequent court appearances so that the judge may review their progress; and rewards for doing well or sanctioned when they do not live up to their obligations (NADCP, 2011). Initially started in Miami, Florida in 1989, there are now more than 2,500 drug courts nationwide (NADCP, 2011).

The drug court model is based on the principle that sustained monitoring of participants with consequences for relapse is effective for ensuring long-term treatment outcomes. This approach provides has been utilized with physicians for over four decades (DuPont & Humphreys, 2011), and has been shown to be effective with both physicians (DuPont, McLellan, White, Merlo, & Gold, 2009) and individuals with alcohol dependence (Stout, Rubin, Zwick, Zywiak, & Bellino, 1999).

A significant body of literature has developed to suggest that drug courts are effective, particularly at reducing recidivism and containing costs. Meta-analyses comparing the outcomes of multiple drug courts have found significant reductions in crime and recidivism for program participants (Aos, Miller, and Drake, 2006; Wilson, Mitchel and McKenzie, 2006; Latimer, Morton-Bourgon, and Chretien, 2006; Shaffer, 2006; Lowenkamp, Holsinger, and Latessa, 2005; Roman, Townsend, Bhati, 2003; Blenko, 2001). Drug courts have also been found to save significant amounts of money for the communities that have utilized them. In addition to savings on reduced probation costs, and future savings on reduced recidivism, costs have been calculated to include reduced spending on child welfare, public healthcare, food stamps, as well as increased tax payments, and reduced mental health and substance abuse treatment costs; and have found savings of $2,600 to $13,000 per participant (Bhati, Roman and Calfin, 2008; Loman, 2004; Finigan, Carey and Cox, 2007; Carey, Finnigan, Crumpton and Waller, 2006; Barnoski and Aos, 2003; Aos, Miller, and Drake, 2006; Logan, Hoyt, and Leukefield, 2001).
The principal aim of the current study is to describe the current model and provide data supporting its efficacy. Specifically, would this model lead to improvements for program participants in regards to criminal justice involvement, substance use, and employment?

Goals/Objectives/Outcomes

As listed previously, the goals of the court include increased levels of community safety, enhanced participant well-being, improved participant social functioning, and high levels of participant program participation. These goals were developed to assure comprehensive outcomes that benefit not only the participant, but the community as well.

The outcomes specified to achieve the program goals are as follows:

**Goal #1: Increase the level of community safety.** - This goal is addressed by decreasing the criminal activity of the participants. Success for the objective was to be measured as follows the percentage of program graduates who decrease or not have any new arrests after graduation.

**Goal #2: Program participants well being will be enhanced.** This goal will be measured by the level of substance use measured by urine drug screens taken by participants.

**Goal #3: Program participants will improve social functioning.** This goal will be measured by the level of improvement in education and employment of participants.

**Goal #4: Program participants will participate at high levels.** This goal will be measured by the level of program participation (intakes) and graduation rates of the participants.

Methodology

This section provides information on the evaluation methods used to determine the effectiveness of the Cumberland County Drug Court. The results of the analyses are reported in the section below.

Sample and Data Collection

The sample consisted of all program participants (n= 55) who entered the program between July 2009 and June 2012. In order to qualify for the program the individual had to be identified as an adult (over 18 years of age), a non-violent offender, and engaged in the appropriate judicial system. Data were collected by members of the drug court team either directly from the participant or through a review of court records and de-identified and aggregate level data (free of information linking it to any individual participant) was provided to the evaluation team for analysis.

Measurement

The court used four outcome variables, all identified in the section on objectives above. “Arrests” referred to any new charges brought after a participant entered the program. “Drug screens” were determined by random urinalysis administered by program personnel. A “positive” test indicated the presence of specific substances, while a “negative” test mean that the
substances were not found. The drug court team theorized that helping the participant’s families become more functional would serve as a protective factor against recidivism and substance use.

Data Analysis
The data for both arrest and drug screen were bivariate, and were therefore analyzed using simple calculation of percentages.

Results

Sample Characteristics
The sample included 55 participants. These individuals participated in an intake interview and provided their own demographic data, (data are summarized in Table 1). Nearly all (94.2%) of the participants identified as Caucasian, while small percentages identified as Hispanic/Latino (4.5%) and Native American (1.1%). Nearly two-thirds (62.6%) were male. Women, however, made up nearly half of the graduates (43.7%), and graduated at slightly higher levels than men (20.5% vs. 15.7%). In terms of substances of choice, 74.4% of participants primarily preferred prescription medications (primarily opiates) or methamphetamines. However, alcohol and marijuana were the most frequently used substances. The demographics and other descriptive information for the sample are included in the table below.

<table>
<thead>
<tr>
<th>Demographic</th>
<th>Categories</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gender</td>
<td>Male</td>
<td>62.6%</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>37.3%</td>
</tr>
<tr>
<td>Ethnicity/Race</td>
<td>Caucasian</td>
<td>94.2%</td>
</tr>
<tr>
<td></td>
<td>Hispanic/Latino</td>
<td>4.5%</td>
</tr>
<tr>
<td></td>
<td>Native American</td>
<td>1.1%</td>
</tr>
<tr>
<td>Substance of Choice</td>
<td>Prescription Meds</td>
<td>38.1%</td>
</tr>
<tr>
<td></td>
<td>Methamphetamine</td>
<td>36.3%</td>
</tr>
<tr>
<td></td>
<td>Marijuana</td>
<td>14.5%</td>
</tr>
<tr>
<td></td>
<td>Alcohol</td>
<td>14.5%</td>
</tr>
<tr>
<td></td>
<td>Heroin</td>
<td>1.8%</td>
</tr>
<tr>
<td>Substances Used</td>
<td>Alcohol</td>
<td>76.3%</td>
</tr>
<tr>
<td></td>
<td>Marijuana</td>
<td>70.9%</td>
</tr>
<tr>
<td></td>
<td>Prescription Meds</td>
<td>70.9%</td>
</tr>
<tr>
<td></td>
<td>Methamphetamine</td>
<td>63.6%</td>
</tr>
<tr>
<td></td>
<td>Cocaine</td>
<td>49.1%</td>
</tr>
<tr>
<td></td>
<td>Heroin</td>
<td>7.2%</td>
</tr>
</tbody>
</table>

Community Service Provided
In addition to the drug court supervision, program participants were involved in a variety of community service projects, completing a total of 200 hours of community service. Additionally, program participants paid over $35,319 towards court costs, and $4,960 towards restitution.

Outcomes
Goal One Arrests
Over the course of the study eleven individuals had graduated for a year or more, and one individual had graduated for two or more years. Arrests were followed on all graduates. Five individuals were rearrested within the first year cohort and two were convicted. Within this cohort 91% of graduates were arrest free and 91% were conviction free for the first year post graduation. No one during the study period was arrested or convicted at the two-year threshold. This is an improvement to prior court outcomes in which 85.7% of participants were arrest free. A total of five individuals (9.1%) were arrested while they were in the program, and four (7.2%) were convicted.

Goal Two Drug Screens
Participants were required to submit to frequent random drug testing. During the past three years (July 1, 2009-June 30, 2012) four thousand and fifty-four drug screens were administered with varying frequency among the program participants. Although this is an average of almost seventy-five tests per person, there was a high degree of variability in the number of tests any individual participant took. Most tests were urinalyses. The drugs included in the test were alcohol, marijuana, cocaine, heroin, hallucinogens, nicotine, methamphetamine, and a panel of other drugs.

The majority of the tests (98.4%) were negative, indicating that none of the substances included in the test were present in the urine at a sufficient level to be recognized. It is important to note that the frequency of positive tests decreased over time with regard to the phase of the program that participants were in at the time of the test. Positive rates during phase one were 2.7%, decreasing to 0.9% at phase two, 0.7% at phase three, and continuing to fall in phase four to 0.3%. As individuals progressed in the program, there was a decreased frequency of drug screens---there were almost two thousand in phase one (1831) and slightly more than three hundred (331) in phase four.

<table>
<thead>
<tr>
<th>Phase</th>
<th>Number of Drug Screens</th>
<th>Number of Positive Drug Screens</th>
<th>Positivity Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Phase 1</td>
<td>1831</td>
<td>50</td>
<td>2.70%</td>
</tr>
<tr>
<td>Phase 2</td>
<td>1204</td>
<td>11</td>
<td>0.90%</td>
</tr>
<tr>
<td>Phase 3</td>
<td>688</td>
<td>5</td>
<td>0.70%</td>
</tr>
<tr>
<td>Phase 4</td>
<td>331</td>
<td>1</td>
<td>0.30%</td>
</tr>
<tr>
<td>All Phases</td>
<td>4054</td>
<td>67</td>
<td>1.60%</td>
</tr>
</tbody>
</table>

Goal Three Employment and Education

Employment and Education
At the time of intake 40% of program participants were unemployed, this improved substantially to a graduation rate of unemployment at 3.1%, significantly below the general population unemployment rate of 9-13% during the study time period. While some participants were employed part time and/or were full time students, there was also a substantial increase in the percentage of participants who were employed full time. Full employment at intake was 7.2%, which improved to 78.1% at graduation. More than half (60%) of those who were employed had held the same job for six months or more. This was a substantial accomplishment for many of the participants. In terms of education, approximately half (46.9%) of the program participants had neither a high school degree nor a GED at intake. This will increase somewhat as two individuals are enrolled in educational programs.

Goal Four Participation

Program Access and Engagement
At the time of the study fifty-five participants had participated in one of the stages of the program during the three years. The courts operated at 65.8% of capacity over the course of the three years. Thirty-two individuals had been released from the program. Sixteen individuals, or slightly more than half (53.3%) of all individuals who were in the program long enough to complete had graduated successfully. A significant number were terminated (40%), and two (6.7%) had been released for non-compliance and were administratively withdrawn. A total of twenty-six individuals remained in the program at the end of the study period, and many of these individuals are expected to complete as well. During the three years, overall the court has a completion rate of 77.1%, as 88 of 114 program participants have completed.

<table>
<thead>
<tr>
<th></th>
<th>Capacity</th>
<th>Admits</th>
<th>Completed</th>
<th>Terminated</th>
<th>Withdrew</th>
<th>Remaining in Program</th>
</tr>
</thead>
<tbody>
<tr>
<td>2009-2010</td>
<td>30</td>
<td>21</td>
<td>0</td>
<td>2</td>
<td>2</td>
<td>18</td>
</tr>
<tr>
<td>2010-2011</td>
<td>30</td>
<td>14</td>
<td>11</td>
<td>4</td>
<td>0</td>
<td>17</td>
</tr>
<tr>
<td>2011-2012</td>
<td>25</td>
<td>20</td>
<td>5</td>
<td>6</td>
<td>0</td>
<td>26</td>
</tr>
<tr>
<td>Three Year Totals</td>
<td>55</td>
<td>16</td>
<td>12</td>
<td>2</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Length of Service
Most of the participants who graduated stayed in the program for an extended period of time. The average length of stay was more than a year (405.5 days). Length of stay did very substantially among some participants. For instance, some individuals were in the program for only a number of days while others stayed for nearly two years.

Additional Outcomes not in listed in the Goals
It is important to note that there are several other measurable outcomes of the court’s success. Seven individuals were able to have their driver’s license restored. Two individuals had their parental rights restored, and two individuals regained custody of their children. Importantly, in terms of the lasting impact of these services, a drug free child was born to one of the program participants, whose life is forever improved by these services.

Discussion
Outcomes for this study strongly support the effectiveness of the Cumberland County Drug Court. Participants showed positive results on all outcomes. Re-arrest rates were low both within and especially post-program for those individuals who graduated. Although results for drug screening were available only in-program, the low rate of positive results supports program effectiveness. Other measurable outcomes suggest that the participants’ lives also improved in many and lasting ways.

Limitations

The study had several limitations. The inability to track substance use post-program is an important limitation. This is a common failing of drug court research, due in large part to ethical and legal considerations. The impact of this inability may be minor, however, given the very low re-arrest rate among program graduates. Although re-arrest is not an adequate proxy for substance abuse, it should be seen as instructive. In the light of both the previous history of these participants and the correlation of substance abuse with problem behavior syndrome (Jessor and Jessor, 1979), a low number of offenses suggests that substance abuse may have been infrequent as well. There is also the possibility that offense may have been slightly underreported. Data collectors were only able to examine police and court records post-program only from the county included in the study. Offenses committed in other geographical areas would not have been discovered. Despite these limitations, it is quite clear that the program was able to make a significant impact on the youth who participated, and in turn on the communities within which they reside.

References


(Available online: [http://www.uc.edu/criminaljustice/graduate/Dissertations/koetzleshaffer.pdf](http://www.uc.edu/criminaljustice/graduate/Dissertations/koetzleshaffer.pdf)).