Metropolitan Detention Center (MDC) Addictions Treatment Program (ATP) Outcome Study Final Report

Prepared for:
The Addictions Treatment Program (ATP)
Metropolitan Detention Center

Prepared By:
Institute for Social Research
University of New Mexico
Paul Guerin PhD and Wayne Pitts PhD

June 2004

Introduction and Background

The primary purpose of the DWI Addictions Treatment Program (ATP) at the Bernalillo County Metropolitan Detention Center (MDC) is to reduce the incidence of DWI in the county by providing quality addiction treatment to DWI offenders in the Jail. The program provides addiction treatment in the MDC and is based upon the disease concept of addiction and the treatment focuses on abstinence from all mood or mind-altering chemicals, including alcohol and narcotics. Program participants include males and females and consists of 128 beds for men and 64 beds for women based upon a therapeutic community model. Services include AA/NA in-house meetings, Moral Reconation Therapy (MRT), relapse prevention, DWI education for multiple offenders, gender specific issues, and HIV/AIDS/STD's education groups.

The Addictions Treatment Program is a 28-day program that is designed as a therapeutic community. Therapeutic Communities differ from other treatment approaches principally in their use of the community, comprising treatment staff and those in recovery, as key agents of change. This approach is often referred to as "community as method." Therapeutic Community members interact in structured and unstructured ways to influence attitudes, perceptions, and behaviors associated with drug use.

In July 2003 the MDC DWI Addictions Treatment Program through the City of Albuquerque contracted with the ISR to evaluate the program by reviewing and analyzing the client satisfaction surveys and by conducting an outcome study. Additionally, we agreed to provide some technical assistance for the program's database.

Prior research has shown that substance abuse treatment can be effective in reducing recidivism through addressing the substance abuse problems of DWI offenders. This study takes an exploratory look at the effectiveness of this jail-based 28-day Therapeutic Community treatment program for DWI offenders in the Bernalillo County Metropolitan Detention Center (MDC).

This is done primarily by comparing new bookings in the MDC of clients who completed the program with a matched comparison group of eligible individuals who for whatever reason did not enter the program. It is beyond the scope of this study to report on the issue of relapse and improvements in social indicators (e.g. employment and living arrangements).

A new booking is measured from the date of the booking that got them in the treatment program for the treatment group and from the booking date that got them into the comparison group. This allows us to report any new bookings for individuals post treatment.

The goal in conducting this preliminary outcome study is to better understand the effectiveness of the Addictions Treatment Program in reducing the incidence of crime as

measured by new bookings for study group participants after they were discharged from treatment and whether they were successful or not.

This type of study is useful for a number of reasons. First, knowledge involving client success and a program can be used in an interactive manner to create a self-correcting system and to improve programs. Second, both funding sources and service providers have a vested interest in utilizing scarce resources in the most effective manner. Programs that are effective in reducing drinking and driving and future contact with the criminal justice system should be replicated. Third, outcome evaluation findings, if valid and reliable, can be used to make programs more useful to the target population.

The remainder of this report contains a brief review of the research design that focuses on how the study was conducted and a brief discussion of the data, a data analysis and discussion section and last a conclusion and recommendations section.

Research Design

This study includes a sample of ATP clients between April 2002 and December 2002 who were clients and according to the program successfully completed the program. During this time, NUMBER clients entered and exited the program. Our sample included 621 clients who entered and exited the program.

Based on available data, we attempted to match the ATP clients who completed the program to a similar group of inmates in the Jail who did not enter the program. In principle, we wanted a sample of Jail inmates who were similar in terms of the number of previous bookings into the Jail, their current offense that got them into the Jail, age, race/ethnicity, and gender who were in the Jail during the same time of the ATP clients. In other words, we wanted a comparison group of people who were otherwise eligible for ATP but for whatever reason did not participate in the program.

The comparison group was gathered using the Jail's information system. We were granted access to the information system by Jail administrators. Because of the complexity associated with trying to match the large number of ATP clients individually or one-to-one we completed an aggregate match. This means we matched by category. For example, we calculated the number of ATP clients who had 1-4 previous bookings, whose current charge was a misdemeanor, who were between 25-24 years of age, who were male and who were Hispanic and then matched them to a group if Jail inmates during the same time period who were similar based upon the listed criteria. We could not have matched on a one-to-one basis because of the time and cost associated with doing it that way. Additionally, the method we used is not uncommon in situations like the one we faced. The disadvantage is the fact the match is not as precise. As you will see in the next section the match turned out to be pretty good.

The following criteria were followed in the selection of the comparison group. A number of independent factors could exclude an offender from being included in the comparison group.

All comparison group members:

- Were matched to Jail inmates who entered the Jail between April 2002 and December 2002.
- Were matched to the ATP clients by gender, age group, race/ethnicity, referring offense, and number of prior bookings in the Jail.

Very importantly, we were not able to match clients on their substance abuse problem. This occurs because the Jail does not routinely collect information on substance use by all arrestees. While this is true we do know, through the use of federal Arrestee Drug Abuse Monitoring (ADAM) program data, that approximately 70% of all arrestees in the Jail test positive for drug use. This means that some members of the control group do not have a substance abuse problem and so don't match on drug use. When possible, we attempted to include as similar a client as possible, although this was not always possible. This process of matching clients greatly improves the reliability of the data and hence the findings.

Once the control group was chosen, we matched them to any new bookings subsequent to the offense that got them into the Jail and into this study. The next section contains two parts. First, is a brief description of the ATP group that uses information that is recorded in the database maintained by program staff. This is followed by the analysis and discussion of the ATP group and control group.

Data Analysis and Discussion

Addictions Treatment Program

This section briefly describes the ATP sample using information that is contained within the ATP's database and is not collected by the Jail's information system. The sample included both individuals who successfully completed the program and individuals who did not successfully complete the program.

Table 1 – Addictions Treatment Program Completion		
	N	%
Yes	475	78.4
No	131	21.6

missing – 2

Slightly more than 75% of the ATP sample successfully completed the program.

Table 2 – Discharge Status		
	N	%
Successful Discharge	465	78.5
Administrative Discharge	32	5.4
Out of Jail	78	13.2
Other	17	2.9

missing – 16

This table further describes the discharge status of the ATP sample. Ten of those who show in the previous table as having completed successfully in this table show as administrative discharge

Table 3 – Average Age	
	ATP
Average Age	35.7

On average study group members were almost 36 years old. The youngest person in the study was 20 years old and the oldest member was 67 years old.

Table 4 – Gender		
Gender	N	%
Male	432	71.1
Female	176	28.9

The majority of individuals were male. Almost 30% of the study group members were female.

Table 5 – Race/Ethnicity		
Race/Ethnicity	N	%
Anglo	126	20.7
Hispanic	339	55.7
American Indian	105	17.3
African American	33	5.4
Other	5	0.9

More than 50% of the individuals self identified as Hispanic, followed by Anglos (20.7%), American Indians (17.3%), African Americans (5.4%), and others (0.0%). The other groups consisted of an individual who identified as Asian and individuals who identified as multi-racial.

Table 6 – Marital Status		
	Frequency	Percent
Divorced	89	15.6
Married	133	23.3
Separated	51	8.9
Single	287	50.2
Widowed	12	2.0

missing - 37

The largest number of individuals were single, followed by those who were married and divorced.

Table 7 – Living Arrangements		
	Frequency	Percent
Alone	107	19.3
Group Home	6	1.1
Homeless	33	6.0
Other Family	157	28.4
With Spouse or Family	250	45.2

missing - 55

Almost 75% of individuals lived with a spouse or family member or other family.

Table 8 – Health Insurance		
	Frequency	Percent
No	532	87.5
Yes	76	12.5

Almost 90% of the ATP clients at the time they were in the program did not have health insurance. This is much greater than the percent of individuals in the general population.

Table 9 – Annual Income		
	Frequency	Percent
<$10,000	140	23.4
$10,000-$19,999	411	68.6
>$20,000	48	8.0

missing - 9

Almost 25% of the sample had annual incomes of less than $10,000 and only 8% had annual incomes greater than $20,000. The majority of individuals had annual incomes between $10,000 and $20,000.

Table 10 – Primary Language Spoken		
	Frequency	Percent
English	515	85.5
Spanish	87	14.5

missing - 6

The majority of individuals were primary English speakers. While this is true a substantive minority were primary Spanish speakers

Table 11 – Substance Abuse Diagnosis		
	Frequency	Percent
303.90 Alcohol Dependence	229	39.8
304.00 Opiod Dependence	20	3.5
304.20 Cocaine Dependence	38	6.6
304.30 Cannabis Dependence	6	1.0
304.40 Amphetamine Dependence	13	2.3
304.90 Poly Substance Dependence	193	33.6
304.90 Psychoactive Dependence	1	.2
305.00 Alcohol Abuse	46	8.0
305.20 Cannabis Abuse	2	.3
305.60 Cocaine Abuse	5	.9
305.70 Amphetamine Abuse	1	.2
Early Discharge	21	3.6

missing - 33

Program staff conducted a clinical interview with inmates in the program in order to better understand their illness and potential treatment. Each inmate is assigned a

diagnosis using categories from the Diagnostic and Statistical Manual IV (DSM IV), which is often considered the "bible" for professionals who make psychiatric diagnoses. Each client is provided an Axis 1 Clinical Syndromes diagnosis. Table 8 reports the clinical diagnoses of the sample. Diagnoses are provided for dependence and abuse by type of drug.

Drug abuse is defined as the use of illicit drugs or the abuse of prescription or over-the-counter drugs for purposes other than those for which they are indicated or in a manner or in quantities other than directed. According to the DSM IV drug abuse symptoms include:

> A pattern of substance use leading to significant impairment in functioning. One of the following must be present within a 12 month period: (1) recurrent use resulting in a failure to fulfill major obligations at work, school, or home; (2) recurrent use in situations which are physically hazardous (e.g., driving while intoxicated); (3) legal problems resulting from recurrent use; or (4) continued use despite significant social or interpersonal problems caused by the substance use. The symptoms do not meet the criteria for substance dependence as abuse is a part of this disorder.

Drug dependence (addiction) is compulsive use of a substance despite negative consequences that can be severe; drug abuse is simply excessive use of a drug or use of a drug for purposes for which it was not medically intended.

Physical dependence on a substance (needing a drug to function) is not necessary or sufficient to define addiction. There are some substances that don't cause addiction but do cause physical dependence (for example, some blood pressure medications) and substances that cause addiction but not classic physical dependence (cocaine withdrawal, for example, doesn't have symptoms like vomiting and chills; it is mainly characterized by depression). According to the DSM IV drug dependence symptoms include:

> Substance use history that includes the following: (1) substance abuse (see below); (2) continuation of use despite related problems; (3) increase in tolerance (more of the drug is needed to achieve the same effect); and (4) withdrawal symptoms

Dependence is a more serious diagnosis than abuse.

The vast majority of individuals were diagnosed as drug or alcohol dependent (87%), The largest number and percent of individuals were diagnosed as either alcohol dependent (39.8%) or poly substance dependent (33.6%). These two categories accounted for almost 75% of the ATP group. Opiod, cocaine, amphetamine, and psychoactive dependent individuals accounted for the remaining dependent individuals. Only 13% of the ATP study group individuals were categorized as abusers. Twenty-one individuals were not given a diagnosis because they apparently discharged from the program prior to the completion of the clinical interview that leads to the diagnosis.

Program Length

On average inmates spent 25.7 days in the program, which is near the programs design length of 28 days. Most frequently inmates spend 27 or 28 days in the program. In the sample one inmate spent 392 days in the program. In a conversation with program staff we were told this occasionally occurs.

In general, individuals progress through drug addiction treatment at varying speeds, so there is no predetermined length of treatment. Those who complete treatment achieve the best outcomes, but even those who drop out may receive some benefit.

Good outcomes from TC treatment are strongly related to treatment duration, which likely reflects benefits derived from the underlying treatment process. Still, treatment duration is a convenient, robust predictor of good outcomes. Individuals who complete at least 90 days of treatment in a TC have significantly better outcomes on average than those who stay for shorter periods.

Traditionally, stays in Therapeutic Communities have varied from 18 to 24 months. Recently, however, funding restrictions have forced some Therapeutic Comminities to significantly reduce stays to 12 months or less and/or develop alternatives to the traditional residential model.

For individuals with many serious problems (e.g., multiple drug addictions, criminal involvement, mental health disorders, and low employment), research again suggests that outcomes were better for those who received Therapeutic Community treatment for 90 days or more. In a DATOS study, treatment outcomes were compared for cocaine addicts with six or seven categories of problems and who remained in treatment at least 90 days. In the year following treatment, only 15 percent of those with over 90 days in TC treatment had returned to weekly cocaine use, compared to 29 percent of those who received over 90 days of outpatient drug-free treatment and 38 percent of those receiving over 3 weeks of inpatient treatment.

Summary

On average clients in the Addictions Treatment Program completed the program successfully and spent an average of just under 26 days in the program. On average clients were male; almost 36 years old; they were Hispanic, Anglo, or American Indian (in that order); were single or married; lived with family; had an annual income less than $20000; had no health insurance; and were drug dependent. This last is very important for the success of the program because drug dependency is difficult to treat. The largest number and percent of individuals were diagnosed as either alcohol dependent (39.8%) or poly substance dependent (33.6%). These two categories accounted for almost 75% of the ATP group.

Addictions Treatment Program and Control Group Analysis

Table 12 – Sample Size		
	Frequency	Percent
Treatment	608	51.8
Control	566	48.2
Total	1174	100.0

Table 1 documents the size of the ATP group and control group. A total of 1174 individuals were included in the study with the treatment group being slightly larger containing 3.6% (42) more individuals.

Table 13 – Average Age			
	All	ATP	Control
Average Age	35.8	35.7	35.9

The average age of each group was nearly identical. On average study group members were almost 36 years old. The youngest person in the study was 20 years old and the oldest member was 67 years old.

Table 14 – Gender				
Gender	ATP		Control	
	N	%	N	%
Male	432	71.1	415	73.3
Female	176	28.9	147	26.0

Missing – 4

The majority of individuals in both groups were male. Almost 30% of the study group members were female.

Table 15 – Race/Ethnicity				
Race/Ethnicity	ATP		Control	
	N	%	N	%
Anglo	126	20.7	119	21.0
Hispanic	339	55.7	310	54.8
American Indian	105	17.3	105	18.6
African American	33	5.4	23	4.1
Other	5	0.9	9	1.5

A small majority of the ATP group (55.7%) and control group (54.8%) were Hispanic. This was followed by Anglos and the American Indians. There were relatively few African Americans and others. The other group consisted of Asians, those who identified as other, and those who identified as multi-racial.

Table 16 – Average Number of Previous Bookings since January 2000			
	All	ATP	Comparison
Average Number of Previous Bookings	3.9	4.7	3.1

On average ATP group members had 4.7 prior bookings compared to 3.1 booking for the comparison. The number of prior bookings ranged between 0-44.

Table 17 – Current Charge Type				
	ATP		Control	
	N	%	N	%
Felony	56	9.2	46	8.2
Misdemeanor	254	41.8	229	40.7
Petty Misdemeanor	18	3.0	17	3.0
Warrant	280	46.0	270	48.0

The largest number and percent of individuals in both the ATP group and control group were in the Jail because of a warrant. We cannot provide information on the type of warrant because the Jail's information system does not record this piece of information so it is easily used. New charges for a misdemeanor were the next most common charge type followed a felony charge and petty misdemeanor charge.

Table 18 - Recidivism Measured as a New Booking into the Jail				
New Booking?	Treatment		Control	
	N	%	N	%
No	420	69.1	367	64.8
Yes	188	30.9	199	35.2

x=2.38 p=.123

This table measures recidivism as a new booking into the Jail on a new charge. In this table we do not include warrants because they are not new charges. Many of the warrants could be for the offense that got them into the Jail while they were in ATP.

This is not easy to verify because, as noted earlier, this information is not easy to access from the Jail's information system.

Fewer treatment group members had a new booking in the time period studied when compared to control group members. The average exposure time for a new booking was 519 days and varied between a minimum of 439 days and a maximum of 715 days.

During this time period 35.2% of the controls and 30.9% of the treatment group had a booking on a new charge. A smaller percentage of the ATP clients had new bookings during the study period but this difference of 4.3% was not statistically significant.

In addition, to bookings on new charges 171 ATP group members were arrested on a warrant only and 175 control group members were arrested on a warrant only. A future study should explore the bookings on warrants more closely.

Table 19 – The Number of New Bookings Measured as One or More than One

Number of Times	Treatment		Control	
	N	%	N	%
One Time	126	67.0%	111	55.8%
More than One Time	62	33.0%	88	44.2%

This table reports the number of times individuals in each group were on average booked one time and more than one time. A larger number and percent of control group members were booked into the Jail more than once. Two-thirds of the individuals in the ATP group were booked once and almost 56% in the control group were booked once.

Table 20 – Average Number of Days to a New Booking

	All	ATP	Control
Average Number of Days	167.6	184.3	151.2

On average ATP group members took more days to a new booking (184.3 days) when compared to the control group (151.2 days).

In total ATP group members performed better than control group members. Fewer ATP clients were booked into the Jail on a new offense during the time period studied, ATP group members recidivated less frequently, and it took longer for ATP group members to pick up a new booking. These are important findings.

Conclusion

The Addictions Treatment Program is a 28-day program that is designed as a therapeutic community. The program follows generally accepted therapeutic community guidelines with the exception that therapeutic communities are generally longer in length than this program's 28-days. Generally therapeutic communities are between 12-18 months in length and modified therapeutic communities are generally a minimum of 6-months in length. Research has shown that treatment outcomes are best for those who receive treatment for a minimum of 90 days. While recent major adaptations that include shorter lengths of stay are being tested this program is considerably less than either a traditional therapeutic community or a modified therapeutic community. This poses a challenge because remaining in treatment for an adequate period of time is critical for treatment effectiveness and traditional therapeutic community programs are designed to be of sufficient length to engage and treat participants. Further, research has shown that those in treatment should be segregated from the general population and that treatment gains can be lost if inmates are returned to the general population after treatment (NIDA, July 2000). According to NIDA (July 2000) relapse and recidivism can be reduced in treatment is continued after returning to the community.

Overall ATP group members did better than control group members. Fewer ATP group members had a subsequent booking, they were subsequently booked into the Jail less frequently and they took on average 18% longer in days to pick up a new booking. These finding are important. These findings must be placed into context with the fact that this program is only 28-days. A longer program could be expected to produce better results. Additionally, the population served by this program is particularly serious when their DSM IV diagnosis, previous booking history and economic situation are considered. It also should be clear that recovery from drug addiction can be a long-term process and often requires multiple episodes of treatment. Relapse often occurs after a successful treatment episode. This is complicated by the many needs of this population.

More research should be considered that reviews the most effective short-term treatment programs and specifically those that are jail-based and focus on the particular needs and problems of this population. Efforts should also be made to provide help following discharge from this program either in the Jail or community. Changes to the program model and aftercare could help further reduce recidivism. Participation in self-help support groups following treatment can be useful in maintaining abstinence. We also recommend tracking this group for a longer period of time in order to gauge how the treatment group differs from the control group in the long term. If possible the program length should be extended beyond the current 28-days. Finally, this study only considered recidivism (new bookings) and did not consider the issue of relapse or improvements in social indicators (e.g. employment, living arrangements). It would be beneficial to include these factors in a future study.