

**SUBSTANCE USE
AMONG
TEXAS DEPARTMENT
OF CORRECTIONS
INMATES, 1988**



Texas Commission on
Alcohol and Drug Abuse

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INMATES, 1988**

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Texas Commission on Alcohol and Drug Abuse
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Preface

We are pleased to report in this volume the results of a survey of substance abuse among inmates entering the Texas Department of Corrections. The survey was funded by the U.S. Department of Education Drug-Free Schools and Communities grant program and was a collaborative effort between the Texas Commission on Alcohol and Drug Abuse and the Public Policy Resource Laboratory of Texas A&M University. We would like to thank the inmates who voluntarily participated in this project and the Texas Department of Corrections for their assistance and support.

In addressing the issue of substance abuse among inmates, we should not fail to recognize the serious implications of this problem for the quality of life of all Texans. Many inmates are addicted to legal and illegal drugs, and their addiction is too often associated with criminal activities.

If this cloud has a silver lining, it is that new approaches for treating incarcerated offenders have been developed and tested. While not fool-proof, there is growing evidence that well designed and carefully implemented treatment programs can reduce criminality and recidivism among offenders.

Bob Dickson, Executive Director
Texas Commission on Alcohol and Drug Abuse

Acknowledgments

Many people contributed their time and effort to this project, but none more than Professor Ben Crouch of the Department of Sociology at Texas A&M University. Among other things, Dr. Crouch authored the criminal justice sections of the questionnaire, orchestrated data collection, and provided advice and consultation in the analytical phase of the project.

We are also grateful for the assistance of Dr. Tony Fabelo of the Criminal Justice Policy Council, who provided expert commentary and suggestions on issues relating to crime and drugs.

Eric Fredlund, Research Specialist
The Texas Commission on Alcohol and Drug Abuse

**SUBSTANCE USE AMONG
TEXAS DEPARTMENT OF CORRECTIONS INMATES**

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SUBSTANCE USE AMONG TEXAS DEPARTMENT OF CORRECTIONS INMATES - 1988

I. EXECUTIVE SUMMARY

1.1 Introduction

This report, based on face-to-face interviews conducted in late 1988, is designed to present an overview of current substance use practices, problems, trends, and the criminal consequences of substance use among offenders entering the Texas Department of Corrections. Comparisons are made between the inmate and general populations, and are based on interviews of over one thousand male inmates and more than twenty-five hundred adult male Texans who were surveyed in a separate research effort in the spring of 1988. Both groups were asked the same questions about substance use, but inmates were queried about such use in the period preceding their last incarceration; questions about substance use while incarcerated were not asked. Data on both inmates and adult males are approximately contemporaneous; that is, most inmates were on the street while the adult survey was collected.

The inmates in this sample are relatively young, likely to be members of racial or ethnic minority groups, inadequately educated (two-thirds have not received the equivalent of a high school diploma), and poor (over one-half report family incomes of less than \$10,000). More than one-half of the sample were remanded to prison after revocation of their probation or parole, and over 40 percent have served a previous term in prison. These inmates have been convicted of a wide variety of serious crimes, and tend to stay in prison only a short time: only about one-half of the inmates interviewed were still in TDC custody six months after entering prison.

When compared to adults in the general population, TDC inmates are more than twice as likely to report lifetime use of illicit drugs (87 percent of inmates compared to 37 percent of male adults), and more than seven times as likely to report illicit drug use in their last month on the street (47 percent of inmates compared to 6 percent of adult males).

1.2 Summary

1.2.1 Kinds of Drugs Used

- * Inmates are almost three times more likely than adult male Texans to use tobacco (81 percent vs. 29 percent).
- * Inmates are over six times more likely to be current users of marijuana (32 percent vs. 5 percent).
- * Inmates are about 15 times more likely to be current users of powdered cocaine (22 percent vs. 1 percent)
- * Inmates are over 40 times more likely to be current users of crack cocaine (10 percent vs. less than .5 percent).
- * Inmates are 16 times more likely to be current amphetamine users (10 percent vs. less than 1 percent).
- * Inmates are more than one hundred times more likely to be current heroin users (8 percent vs. less than .5 percent).

1.2.2 Consumption Patterns

- * 23 percent of inmates and 7 percent of adult male Texans drink alcohol daily; 20 percent of inmates and 2 percent of adult males usually drink more than 10 drinks per occasion.
- * 28 percent of inmates use at least one illicit substance daily. About 23 percent of inmates spent \$200 or more for illicit drugs in their last month on the street.
- * Inmates report daily use of illicit drugs at the following rates: marijuana, 15 percent; powdered cocaine, 10 percent; crack cocaine, 3 percent; amphetamines, 5 percent; and heroin, 4 percent.
- * 34 percent of younger inmates (age 18-25) use an illicit drug daily.
- * 7 percent of Black inmates smoke crack cocaine every day; 9 percent reported spending more than \$200 for crack cocaine in their last month on the street.
- * 12 percent of White inmates use amphetamines daily. Almost no daily users of this drug are over the age of 35.
- * 7 percent of Hispanic inmates use heroin every day.

1.2.3 Substance-Related Problems

- * Inmates are more likely to have both alcohol and drug problems than just alcohol or drug problems.
- * 72 percent of inmates experienced at least one alcohol and/or drug problem in their last year on the street.
- * 28 percent of inmates have both significant alcohol and drug problems; that is, they experienced three or more alcohol problems and three or more drug problems in the previous year.
- * 21 percent of inmates have both severe alcohol and drug problems; that is, they experienced five or more alcohol problems and five or more drug problems in the previous year.
- * More than one-half of the inmates report at least one alcohol problem in their last year on the street; 46 percent have at least significant alcohol problems and 38 percent have severe alcohol problems.
- * Three of the alcohol problems that inmates report at much higher rates than adult males are directly associated with employment: losing or nearly losing a job, getting high or tight at work, and not going to work because of a hangover.
- * Hispanic inmates have the highest rates of significant alcohol problems (55 percent) and severe alcohol problems (48 percent).
- * 53 percent of inmates experienced at least one drug problem in their last year on the street; 44 percent have at least significant drug problems, and 37 percent have severe drug problems.
- * Inmates are as much as 51 times more likely than adult males to report specific drug problems. Inmates are on average about 24 times more likely than adult males to report any given drug problem.
- * White inmates tend to report drug problems at higher rates than Black or Hispanic inmates.

1.2.4 Trends in Substance Use

- * Cocaine and amphetamines became more widely available and popular among people 18 or younger during the past 10 years. However, prison inmates are much more likely to report availability and use of such drugs than are adult males.
- * Since 1984 there have been sharp increases in both availability and initial use of crack cocaine reported by Blacks; the magnitude of these increases is reminiscent of the increased marijuana use by the general population in the late 1960s and early 1970s.

- * Increased availability and use of amphetamines has occurred primarily among Whites.
- * There are indications in the inmate sample that heroin has recently become more popular among those young Hispanics who end up in prison.

1.2.5 Intravenous Drug Use and Needle-Sharing

- * 36 percent of inmates injected illicit drugs at some point in their lives, 20 percent within their last month on the street.
- * 23 percent of inmates have shared needles, 9 percent within their last month on the street.
- * The most popular drug which is injected by inmates is cocaine. About 30 percent of inmates have injected this drug, 13 percent within the month prior to their last incarceration.
- * Inmates report intravenous use of amphetamine and heroin at similar rates. About 22 percent have ever injected these substances, and 7 percent are current injectors.
- * There is strong evidence that needle-sharing is associated with the use of cocaine and amphetamines as well as heroin.
- * One of the best predictors of needle-sharing is the number of different drugs which inmates inject: of inmates who injected three or more different substances, 90 percent also shared needles.
- * Almost all inmate intravenous drug users have some knowledge of AIDS (97 percent) and agree that AIDS has reached epidemic proportions (87 percent). However, many have not made a connection between using needles, needle-sharing, and risk of HIV infection: of lifetime injectors, 35 percent say they have no chance of contracting AIDS, and of those that shared needles in their last month on the street, 28 percent believe they have no chance of contracting AIDS.

1.2.6 Drugs and Criminality

- * Heavy use of marijuana is associated with intense criminal involvement, high illegal incomes, employment problems, violence, and recidivism, but to a lesser degree than heavy use of cocaine, amphetamines and heroin.
- * Inmates heavily involved with more expensive illicit drugs such as cocaine, amphetamines, and heroin have higher illegal incomes: two-thirds report illegal income of \$400 or more per week in their last year on the street. Their illegal income in part translates to economic loss for the general public.

- * Inmates heavily involved with more expensive drugs have more employment problems than inmates with less expensive drug habits: 34 percent were unemployed in the year preceding their last incarceration, and 22 percent were only working part-time. Those inmates with the greatest need for money to support their habits also have the greatest difficulty maintaining such legitimate employment.

- * 58 percent of inmates heavily involved with more expensive drugs have previously served at least one term in prison, a percentage which is higher than inmates with other types of substance involvements.

II. DESCRIPTION OF THE STUDY

The methods and techniques used in this survey are described in a technical report issued separately (Dyer and Carmichael, 1988). The following discussion is a brief summary of the key elements of the project design, questionnaire, sample size, and limitations of the study.

2.1 Project Design

This research is based on in-person interviews with 1,027 of the approximately seven thousand male inmates who entered the Texas Department of Corrections (TDC) between mid-September and mid-December of 1988. Interviews were conducted on-site at the Goree Unit in Huntsville, Texas, which is the central reception center for all males entering the TDC system.

Potential interviewees were selected randomly from a list of all the inmates processed for admission into TDC each day. Of 120 daily potential interviewees, approximately 30 were selected to be interviewed each evening. All inmates processed into TDC in a single day had an equal chance of being asked to participate in the project. Only 36 inmates declined to cooperate, giving the project an overall cooperation rate of 97 percent. Interviewers were Masters and Doctoral students in Criminology or Sociology at Sam Houston University. Bi-lingual interviewers were available for Spanish-speaking inmates. Data from the completed questionnaires were entered at the Public Policy Resources Laboratory at Texas A&M University using rigorous quality control procedures.

2.2 Survey Instruments

The TCADA inmate questionnaire is more than 50 pages in length and contains over 700 questions. However, it is structured so that inmates who had used relatively few substances were asked relatively few questions. Since most inmates reported extensive and diverse substance use histories, many interviews required two hours or more to complete, compared to an average of about 20 minutes for the TCADA questionnaire for non-incarcerated adults.

The questionnaire asks questions about both substance use and criminal behavior. The section on substance use is adapted from the instrument used in the *1988 Texas Survey of Substance Use Among Adults* (Spence, *et. al.*, 1989), and contains questions about use of ten substances or classes of substances (tobacco, alcohol, inhalants, marijuana, powdered cocaine and crack cocaine, stimulants, sedatives and tranquilizers, heroin, other opiates and psychedelics), substance-related symptoms and problems, opinions about substance use, treatment, family background, general demographics and many other issues. The primary difference between substance use questions asked of non-incarcerated adults and inmates is that inmates reported on behaviors which occurred while they were last on the street. Questions about substance use while incarcerated were not asked and this issue is not covered in this report.

The second section pertains to past and current involvement with the law and the role of substance use in these activities. Written by Dr. Ben Crouch of Texas A&M University, these questions highlight the criminal context of substance use. The third component of this data, official information about offenders received from TDC, includes information on offense of record, previous confinement and the mental and physical state of individual inmates.

The TCADA inmate questionnaire provides an overview of the role of substance use in the lives of those who end up in the prison system. Much of this information can be compared to that collected on a non-incarcerated sample matched on the basis of sex, age, and/or race/ethnicity. This ability to compare provides a context for understanding some of the unique properties of reports of substance abuse provided by inmates.

The inmate data set contains both subjective and objective components. The subjective data, composed of self-reported substance use and criminal behaviors, is important because it reports on activities which are difficult to study in any other way. Because both criminal activity and substance abuse are clandestine activities, the interrelationships between the two cannot fully be shown in official statistics. Also, crime statistics based on official records are difficult to generalize to the overall crime scene because they address only those crimes resulting in arrest or conviction. However, objective data, such as those available from TDC official reports, are helpful in terms of clarifying the meaning of subjective reports and grounding it in terms of some objectively verifiable reality.

2.3 The Inmate Sample

Presented in Table 2.3.1 are demographics on the 1,027 responding inmates; included are age, race/ethnicity, marital status, education, employment status, family income in the year preceding incarceration, and the administrative route to prison.

Thirteen of the 1,027 inmates are under the age of 18. While these inmates are included in estimates made for the sample as a whole, results are not separately reported for this age group because of small sample size. About 41 percent of inmates are between the ages of 26 and 34 (“middle inmates”) while 35 percent are between the age of 18 and 25 (“younger inmates”). Inmates 35 and over (“older inmates”) are underrepresented in the inmate sample as compared to the general population (23 percent vs. 53 percent).

Presented in Table 2.3.2 are the wide range of charges on which inmates were sentenced to prison, from murder to public order offenses. The most frequent charge is burglary of a habitat (114) followed by burglary of a building (96). About 20 percent of inmates were sentenced on these two charges.

Table 2.3.1
Demographics of TDC Male Inmate Sample

	Younger Inmates (18 to 25)		Middle Inmates (26 to 34)		Older Inmates (35 or older)		All			
	N	%	N	%	N	%	N	%		
Total	13	(1.3%)	361	(35.2%)	418	(40.7%)	235	(22.9%)	1027	(100.0%)
Race/Ethnicity										
White	2	(15.4%)	131	(36.3%)	135	(32.3%)	100	(42.6%)	368	(35.8%)
Black	5	(38.5%)	142	(39.3%)	192	(45.9%)	85	(36.2%)	424	(41.3%)
Hispanic	6	(46.2%)	84	(23.3%)	88	(21.1%)	50	(21.3%)	228	(22.2%)
Other	0	(0.0%)	4	(1.1%)	3	(0.7%)	0	(0.0%)	7	(0.7%)
Marital Status										
Married	2	(15.4%)	89	(24.7%)	173	(41.4%)	91	(38.7%)	355	(34.6%)
Widowed	0	(0.0%)	0	(0.0%)	7	(1.7%)	5	(2.1%)	12	(1.2%)
Divorced	0	(0.0%)	18	(5.0%)	72	(17.2%)	77	(32.8%)	167	(16.3%)
Separated	0	(0.0%)	25	(6.9%)	28	(6.7%)	27	(11.5%)	80	(7.8%)
Never Married	11	(84.6%)	227	(62.9%)	138	(33.0%)	35	(14.9%)	411	(40.0%)
Don't Know/Refuse	0	(0.0%)	2	(0.6%)	0	(0.0%)	0	(0.0%)	2	(0.2%)
Education										
Did not complete H.S.	13	(100.0%)	259	(71.7%)	275	(65.8%)	138	(58.7%)	685	(66.7%)
High school Graduate	0	(0.0%)	77	(21.3%)	95	(22.7%)	49	(20.9%)	221	(21.5%)
Some College	0	(0.0%)	17	(4.7%)	25	(6.0%)	31	(13.2%)	73	(7.1%)
College Graduate	0	(0.0%)	1	(0.3%)	11	(2.6%)	11	(4.7%)	23	(2.2%)
Don't Know/Refuse	0	(0.0%)	7	(1.9%)	12	(2.9%)	6	(2.6%)	25	(2.4%)
Employment Status										
Working Full-time	3	(23.1%)	194	(53.7%)	248	(59.3%)	129	(54.9%)	574	(55.9%)
Working Part-time	4	(30.8%)	77	(21.3%)	95	(22.7%)	59	(25.1%)	235	(22.9%)
Attending School	2	(15.4%)	20	(5.5%)	6	(1.4%)	3	(1.3%)	31	(3.0%)
Disabled	0	(0.0%)	0	(0.0%)	6	(1.4%)	8	(3.4%)	14	(1.4%)
Retired	0	(0.0%)	0	(0.0%)	0	(0.0%)	4	(1.7%)	4	(0.4%)
Unemployed	4	(30.8%)	68	(18.8%)	63	(15.1%)	32	(13.6%)	167	(16.3%)
Don't Know/Refuse	0	(0.0%)	2	(0.6%)	0	(0.0%)	0	(0.0%)	2	(0.2%)
Family Income										
Under \$10,000	7	(53.8%)	174	(48.2%)	197	(47.1%)	111	(47.2%)	489	(47.6%)
\$10,000 - \$19,999	1	(7.7%)	74	(20.5%)	85	(20.3%)	59	(25.1%)	219	(21.3%)
\$20,000 - \$29,999	0	(0.0%)	28	(7.8%)	56	(13.4%)	31	(13.2%)	115	(11.2%)
\$30,000 - \$39,999	1	(7.7%)	17	(4.7%)	22	(5.3%)	10	(4.3%)	50	(4.9%)
\$40,000 - \$49,999	0	(0.0%)	6	(1.7%)	8	(1.9%)	5	(2.1%)	19	(1.9%)
\$50,000 and above	1	(7.7%)	22	(6.1%)	23	(5.5%)	13	(5.5%)	59	(5.7%)
Don't Know/Refuse	3	(23.1%)	40	(11.1%)	27	(6.5%)	6	(2.6%)	76	(7.4%)
Route To Prison										
Probation Revoked	6	(46.2%)	155	(42.9%)	114	(27.3%)	51	(21.7%)	326	(31.7%)
Parole Revoked	1	(7.7%)	92	(25.5%)	109	(26.1%)	57	(24.3%)	259	(25.2%)
Direct Sentence	6	(46.2%)	113	(31.3%)	195	(46.7%)	127	(54.0%)	441	(42.9%)
Don't Know/Refuse	0	(0.0%)	1	(0.3%)	0	(0.0%)	0	(0.0%)	1	(0.1%)

Table 2.3.2A
Crime of Record of TDC Male Inmate Sample

	Younger Inmates (Under 18)	Younger Inmates (18 to 25)	Middle Inmates (26 to 34)	Older Inmates (35 or older)	All
Crimes Against Persons	4 (30.8%)	74 (20.7%)	90 (21.7%)	45 (19.3%)	213 (20.9%)
MURDER	0 (0.0%)	8 (2.2%)	11 (2.7%)	6 (2.6%)	25 (2.5%)
ATTEMPTED MURDER	0 (0.0%)	2 (0.6%)	4 (1.0%)	1 (0.4%)	7 (0.7%)
VOL. MANSLAUGHTER	0 (0.0%)	0 (0.0%)	0 (0.0%)	2 (0.9%)	2 (0.2%)
INVOL. MANSLAUGHTER	0 (0.0%)	1 (0.3%)	2 (0.5%)	0 (0.0%)	3 (0.3%)
AGGRAV. KIDNAPPING	0 (0.0%)	0 (0.0%)	1 (0.2%)	1 (0.4%)	2 (0.2%)
KIDNAPPING	0 (0.0%)	2 (0.6%)	0 (0.0%)	0 (0.0%)	2 (0.2%)
SEX ASSAULT/AGGRAV.	2 (15.4%)	10 (2.8%)	19 (4.6%)	5 (2.1%)	36 (3.5%)
SEX ASSAULT/CHILD	0 (0.0%)	6 (1.7%)	6 (1.4%)	10 (4.3%)	22 (2.2%)
SEX ASSAULT/RAPE	0 (0.0%)	0 (0.0%)	1 (0.2%)	0 (0.0%)	1 (0.1%)
SEX ASSAULT/OTHER	0 (0.0%)	0 (0.0%)	1 (0.2%)	0 (0.0%)	1 (0.1%)
ROBBERY/NO WEAPON	2 (15.4%)	26 (7.3%)	24 (5.8%)	7 (3.0%)	59 (5.8%)
ROBBERY/W/WEAPON	0 (0.0%)	2 (0.6%)	3 (0.7%)	3 (1.3%)	8 (0.8%)
ASSAULT	0 (0.0%)	7 (2.0%)	15 (3.6%)	7 (3.0%)	29 (2.9%)
ASSAULT/OFFICER	0 (0.0%)	4 (1.1%)	2 (0.5%)	2 (0.9%)	8 (0.8%)
ASSAULT-INJURY/CHILD	0 (0.0%)	6 (1.7%)	1 (0.2%)	1 (0.4%)	8 (0.8%)
Crimes Against Property	8 (61.5%)	215 (60.2%)	183 (44.2%)	85 (36.5%)	491 (48.3%)
ARSON	1 (7.7%)	4 (1.1%)	1 (0.2%)	1 (0.4%)	7 (0.7%)
BURGLARY	0 (0.0%)	5 (1.4%)	4 (1.0%)	1 (0.4%)	10 (1.0%)
BURGLARY OF HABITAT	1 (7.7%)	64 (17.9%)	36 (8.7%)	13 (5.6%)	114 (11.2%)
BURGLARY/SEX INTENT	0 (0.0%)	0 (0.0%)	1 (0.2%)	0 (0.0%)	1 (0.1%)
BURGLARY OF BLDG	2 (15.4%)	37 (10.4%)	39 (9.4%)	18 (7.7%)	96 (9.4%)
BURGLARY OF VEHICLE	1 (7.7%)	35 (9.8%)	19 (4.6%)	4 (1.7%)	59 (5.8%)
BURGLARY ATTEMPT/HABITAT	0 (0.0%)	1 (0.3%)	2 (0.5%)	1 (0.4%)	4 (0.4%)
BURGLARY ATTEMPT/BLDG	0 (0.0%)	3 (0.8%)	3 (0.7%)	0 (0.0%)	6 (0.6%)
THEFT/CREDIT CARD	1 (7.7%)	11 (3.1%)	23 (5.6%)	13 (5.6%)	48 (4.7%)
THEFT OF PERSON	0 (0.0%)	4 (1.1%)	3 (0.7%)	1 (0.4%)	8 (0.8%)
THEFT BY RECEIPT	0 (0.0%)	0 (0.0%)	1 (0.2%)	1 (0.4%)	2 (0.2%)
THEFT OF PROPERTY	0 (0.0%)	6 (1.7%)	10 (2.4%)	13 (5.6%)	29 (2.9%)
THEFT OF SERVICE	0 (0.0%)	0 (0.0%)	1 (0.2%)	0 (0.0%)	1 (0.1%)
THEFT/LIVESTOCK	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.4%)	1 (0.1%)
THEFT/BAD CHECK	0 (0.0%)	0 (0.0%)	1 (0.2%)	0 (0.0%)	1 (0.1%)
THEFT/VEHICLE	1 (7.7%)	3 (0.8%)	1 (0.2%)	1 (0.4%)	6 (0.6%)
UNAUTH VEHICLE	1 (7.7%)	26 (7.3%)	16 (3.9%)	9 (3.9%)	52 (5.1%)
FORGERY OF CHECK	0 (0.0%)	2 (0.6%)	3 (0.7%)	1 (0.4%)	6 (0.6%)
FORGERY	0 (0.0%)	7 (2.0%)	8 (1.9%)	1 (0.4%)	16 (1.6%)
PASSING FORGERY	0 (0.0%)	6 (1.7%)	5 (1.2%)	2 (0.9%)	13 (1.3%)
POSSESS FORGERY	0 (0.0%)	0 (0.0%)	1 (0.2%)	0 (0.0%)	1 (0.1%)
POSSESS COUNTERFEIT	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.4%)	1 (0.1%)
PASS COUNTERFEIT	0 (0.0%)	1 (0.3%)	4 (1.0%)	2 (0.9%)	7 (0.7%)
TRANSPORT COUNTERFEIT	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.4%)	1 (0.1%)
ATT TO PASS FORG	0 (0.0%)	0 (0.0%)	1 (0.2%)	0 (0.0%)	1 (0.1%)

TDC records indicate that 475 inmates (46 percent) participating in this survey had already been discharged from TDC custody by the end of March, 1989, after serving six or fewer months. Some 350 inmates were paroled, 62 remanded to mandatory supervision, 19 probated, and the remainder discharged under a variety of provisions ranging from medical reprieves to bench warrants originating in other jurisdictions.

Table 2.3.2B
Crime of Record of TDC Male Inmate Sample

Drug Crimes	1 (7.7%)	57 (16.0%)	108 (26.1%)	61 (26.2%)	227 (22.3%)
POSSESS HALLUCINOGEN	0 (0.0%)	2 (0.6%)	0 (0.0%)	0 (0.0%)	2 (0.2%)
DISTRIB HEROIN	0 (0.0%)	2 (0.6%)	1 (0.2%)	5 (2.1%)	8 (0.8%)
POSSESS HEROIN	0 (0.0%)	1 (0.3%)	6 (1.4%)	7 (3.0%)	14 (1.4%)
DIST COCAINE	0 (0.0%)	16 (4.5%)	19 (4.6%)	13 (5.6%)	48 (4.7%)
POSS COCAINE	1 (7.7%)	18 (5.0%)	31 (7.5%)	17 (7.3%)	67 (6.6%)
DIST CONT SUBSTANCE	0 (0.0%)	7 (2.0%)	14 (3.4%)	6 (2.6%)	27 (2.7%)
POSS CONT SUBSTANCE	0 (0.0%)	3 (0.8%)	11 (2.7%)	6 (2.6%)	20 (2.0%)
MANU CONT SUBSTANCE	0 (0.0%)	1 (0.3%)	0 (0.0%)	0 (0.0%)	1 (0.1%)
DIST MARIJUANA	0 (0.0%)	1 (0.3%)	6 (1.4%)	2 (0.9%)	9 (0.9%)
POSS MARIJUANA	0 (0.0%)	1 (0.3%)	7 (1.7%)	5 (2.1%)	13 (1.3%)
MANU AMPHETAMINE	0 (0.0%)	0 (0.0%)	3 (0.7%)	0 (0.0%)	3 (0.3%)
POSS AMPHETAMINE	0 (0.0%)	4 (1.1%)	7 (1.7%)	0 (0.0%)	11 (1.1%)
DIST AMPHETAMINE	0 (0.0%)	1 (0.3%)	3 (0.7%)	0 (0.0%)	4 (0.4%)

Misc. Crimes	0 (0.0%)	11 (3.1%)	33 (8.0%)	42 (18.0%)	86 (8.5%)
INCEST	0 (0.0%)	0 (0.0%)	1 (0.2%)	0 (0.0%)	1 (0.1%)
INDECENCY/EXPOSE	0 (0.0%)	4 (1.1%)	9 (2.2%)	12 (5.2%)	25 (2.5%)
ESCAPE	0 (0.0%)	2 (0.6%)	0 (0.0%)	0 (0.0%)	2 (0.2%)
FAIL TO APPEAR	0 (0.0%)	1 (0.3%)	1 (0.2%)	2 (0.9%)	4 (0.4%)
BRIBE-RECEIVING	0 (0.0%)	1 (0.3%)	6 (1.4%)	3 (1.3%)	10 (1.0%)
BRIBE	0 (0.0%)	0 (0.0%)	13 (3.1%)	23 (9.9%)	36 (3.5%)
PUBLIC ORDER	0 (0.0%)	3 (0.8%)	3 (0.7%)	2 (0.9%)	8 (0.8%)
CHARGE NOT CLEAR	0 (0.0%)	1 (0.3%)	2 (0.5%)	0 (0.0%)	3 (0.3%)

2.4 Limitations

2.4.1 Self-Reported Information on Substance Use and Criminal Behavior

Data in this report are primarily based on self-reported information. While a number of studies have established the utility of self-reported information in estimating the prevalence of substance use, the accuracy of the data ultimately depends on the truthfulness, recall and comprehension of the respondents. This study was carefully designed and administered to minimize these potential sources of error; the procedures used are described in a separate report. Nevertheless, some under- or overreporting of alcohol and drug use may have occurred. It is significant to note that despite its inherent problems, the survey process appears to be the only practical method available for estimating the incidence and prevalence of largely clandestine behaviors.

Among researchers there is consensus that populations surveyed in criminal justice contexts tend to underreport the extent of their substance use and criminal involvements (MacBride & McCoy, 1982). Therefore, the data presented here are more likely to underestimate rather than overestimate the extent of substance use and criminal involvements in this population.

2.4.2 Sampling Error

The data presented in this report are based on a sample drawn such that confidence intervals for all estimates can be ascertained; maximum confidence limits are presented as part of tabular presentations in Appendix A. Readers requiring additional information on the computational procedures utilized are requested to consult the technical documentation issued separately. Those requiring more general information about sampling error in the context of alcohol and drug surveys should consult the technical documentation in the *National Household Survey on Drug Abuse: Main Findings 1988*.

2.5 Other Related Studies

The adult population of Texas was sampled in a separate but related investigation (see *1988 Texas Survey of Substance Use Among Adults*) and responses provided by adult male Texans are used for comparison throughout this report. Data from youthful offenders entering the Texas Youth Commission (TYC) system are being collected and results will be issued as a separate report. Another related report is *Substance Use Among Texas Secondary Students -- 1988*.

2.6 Editorial Conventions

For purposes of clarity and convenience, this document is written as if the estimate for the sample applies directly to the sample from which it was drawn. For example, the technically correct form of the statement “About 80 percent of inmates age 18 to 25 used alcohol in the past year” would read “About 80 percent of respondents, 18 to 25 years of age, reported use of alcohol in the past year.” Use of the former phrasing was adopted to make the document more readable where several estimates are in close proximity. However, the reader is encouraged to remember that all estimates are based on a sample and therefore subject to sampling error when generalizing to the prison population.

2.7 Terms

A number of terms which have specialized usage in this report are defined below. Please note that when the terms are used, these specific parameters apply:

2.7.1 Texas Adult Males/ TDC Inmates

Texas adult males or *adult males* refers to the non-incarcerated males sampled in the general population survey conducted by TCADA in 1988.

TDC inmates or *inmates* refers to the male inmates entering the Texas Department of Corrections who were sampled in this survey.

2.7.2 Prevalence estimates

Prevalence refers to the percentage of inmates reporting use of a substance at a given time. While prevalence does not indicate frequency or quantity of use, it does offer a convenient means for identifying substance use correlates and is therefore one of the most important measures of substance use in a population.

Lifetime prevalence refers to the percent of individuals that have used a substance at least once. It is primarily a historical measure of exposure to substances and is useful for understanding changes in substance use patterns.

Current prevalence refers to the percentage that have used in the past month. This estimate is primarily a measure of active substance users in a population.

Past year prevalence is a measure of those who have used a substance within the past year, but excludes those who used within the past month. This estimate is useful for measuring more casual substance users, such as those who might use in a social context, but tend not to use substances on a frequent basis.

2.7.3 Age Categories:

Younger inmates are persons age 18 to 25.

Middle inmates are persons age 26 to 34.

Older inmates are persons age 35 and older.

2.7.4 Types of Substances:

Licit substances are those which are not defined as controlled substances by federal or state statute. Alcohol, tobacco, and inhalants are the three categories of licit substances in this report.

Illicit substances are those which are defined as controlled by federal or state statute. Marijuana, powdered cocaine, crack cocaine, uppers, downers, heroin, opiates other than heroin, and psychedelics are the eight categories of illicit substances queried in this project. Illicit substances include commercially produced psychoactive drugs which were not prescribed by a physician or which have been diverted for uses other than those prescribed.

2.7.5 Cocaine Terminology

Powdered cocaine refers to cocaine hydrochloride, the traditional form of cocaine; a fine powder, this form of cocaine is usually snorted or dissolved in solution and injected.

Crack cocaine refers to a solid form of cocaine, usually of higher purity and smokable.

Cocaine, when used alone, refers to both forms.

2.7.5 Intravenous Drug Users (IVDUs)

Intravenous drug users, needle users, or IVDUs are respondents who report having used drugs by injection for non-medical purposes, either intravenously or subcutaneously (skin popping).

2.8 A Structural and Comparative Framework for Data Interpretation

The approach in this document's interpretation of incidence and prevalence data is structural. Measured prevalence of use is produced by an interaction of demographic and social factors which tend to be stable over a short term. For example, based on experience, it is not likely that a sudden outbreak of heroin use by women over the age of 70 will occur in the coming year. It is likely, however, that some adolescents will try marijuana for the first time and that some individuals in their late twenties will abandon use of this substance. These patterns are different for each substance. While this seems obvious, the implications of this perspective are more subtle.

The first is that prevalence measures taken at a single point in time are, in fact, a collection of past historical trends, current events, and information about the near future. For example, imagine a hypothetical "Drug A" with the following prevalence profile:

1. All persons who have used "Drug A" are over the age of 35 (10 percent of this age group)
2. All those who used "Drug A" last did so more than a year ago.

A different imaginary “Drug B” has the following prevalence of use profile:

1. 10 percent of adults age 18 to 25 have used “Drug B” in the past month.
2. There are no lifetime users of this substance that have not used it within the past month.

The interpretation of this hypothetical data is obvious: “Drug A” has faded in popularity and “Drug B” is sharply increasing in popularity. While changing rates underlying most real prevalence profiles are not this easy to interpret, it is possible to infer a great deal about historical and current use trends from prevalence of use profiles collected at a single point in time. The key to making such inferences is organizing data to facilitate comparisons of recency of use among people of different ages.

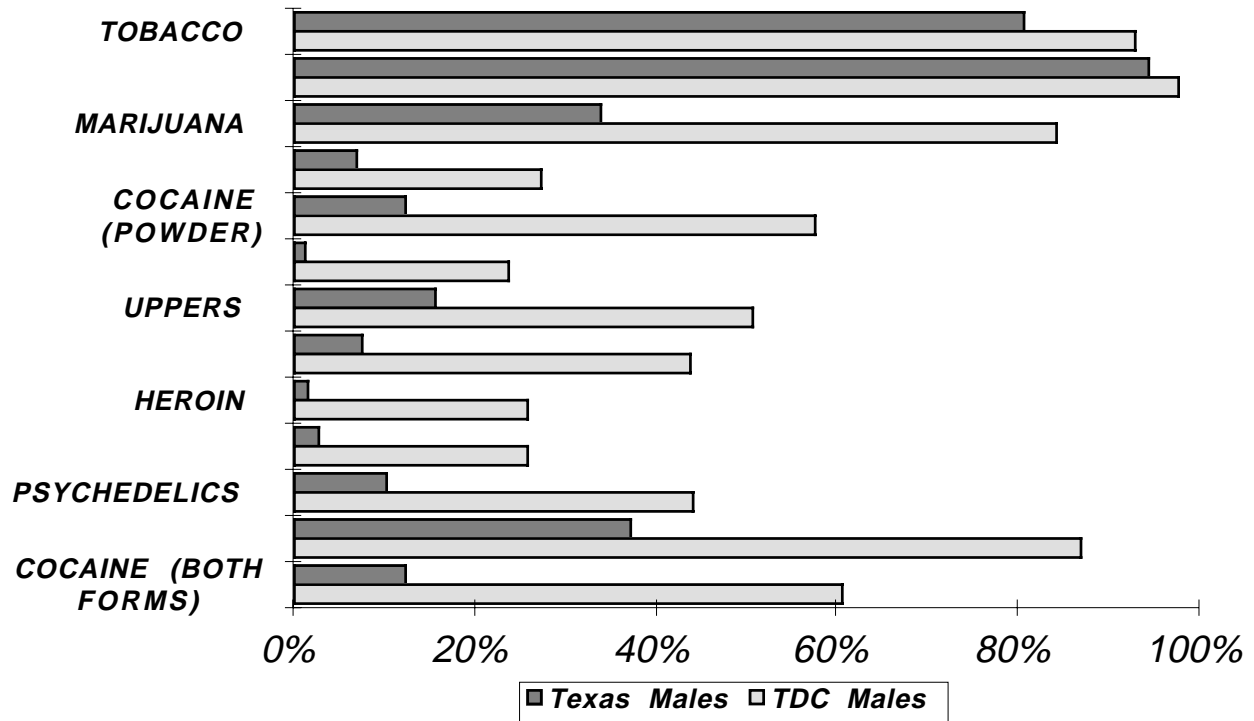
Most prevalence information in this document is organized to facilitate comparisons of current use, past year (but not past month) use, and lifetime use among three separate age groups over a number of different substances (see Appendix A). Comparison of these measures over a number of drugs can provide a relatively accurate sense of current trends in substance use among specific segments of the population. However, these comparisons are not a substitute for more rigorous methodologies such as surveys taken at repeated intervals through time.

Where feasible, data on Texas adult males is provided as a comparison to data on inmates. Such comparisons provide an empirical basis upon which to understand how the substance use behaviors of inmates differ from the general population. However, there are some limitations to these comparisons. The general population survey collected data by telephone, whereas the prison survey utilized a face-to-face interview method; however, findings of other state surveys indicate that telephone interview methods are effective in obtaining self reports of substance use, and are comparable to other surveys using in-person methodologies. Also, because some behaviors common among inmates are rare (and difficult to measure) in the adult male population, in such cases only data on inmates is presented. Another limitation to comparison is based on the fact that age and racial/ethnic structures of inmate and non-incarcerated populations are quite different. On average, inmates are younger than adult males and a higher percentage are racial/ethnic minorities. In order to partially control for these differences, age and racial/ethnic comparisons between inmates and Texas adult males are presented where practical.

While there are some limitations to these comparisons, there are also some unique aspects to these two data sets. As previously described, both groups were asked essentially the same questions about substance use at approximately the same time; most inmates were on the street while the adult survey was collected. Finally, since surveyed inmates were male, data obtained from males in the non-incarcerated population are used for comparative purposes.

III. SUBSTANCE USE PATTERNS

Fig 3.1A Lifetime Substance Use: TDC Male Inmates and Texas Male Adults, 1988



3.1 Comparisons to Adult Males in the General Population

Inmates entering TDC are much more likely to have used substances than non-incarcerated adult male Texans (Fig 3.1A). Differences are relatively small between the lifetime prevalence of alcohol and tobacco of inmates and adult males. However, differences on illicit drugs are greater: about 87 percent of inmates compared to 37 percent of adult males admit using an illicit drug at least once.

Inmates are also more likely than adult males to report current use on most substances (Fig 3.1B). As with lifetime prevalence, differences in current use of alcohol are small but a much higher percentage of inmates are currently tobacco smokers. More pronounced, however, are the differences on recent use of all types of illicit drugs. Current use of heroin and other opiates is rarely reported by adult males. Overall, 47 percent of inmates as compared to 6 percent of adult males admit current use of one or more illicit drugs within the past month.

Some portion of differences in reported substance use are attributable to demographic differences between inmate and adult populations. Male inmates, on average, are younger and therefore more likely to be current substance users (Spence *et. al.*, 1989). In order to partially control for this source of difference, lifetime and current use of selected substances are compared between inmates and adult males of approximately the same age (Table 3.1). Also presented is a ratio which is computed by dividing inmate prevalence of use by a comparable adult prevalence of use. Interpretation of this measure is straightforward: Inmates are [ratio] times more likely than adult males to use [type of substance].

Fig 3.1B Current Substance Use: TDC Male Inmates and Texas Male Adults, 1988

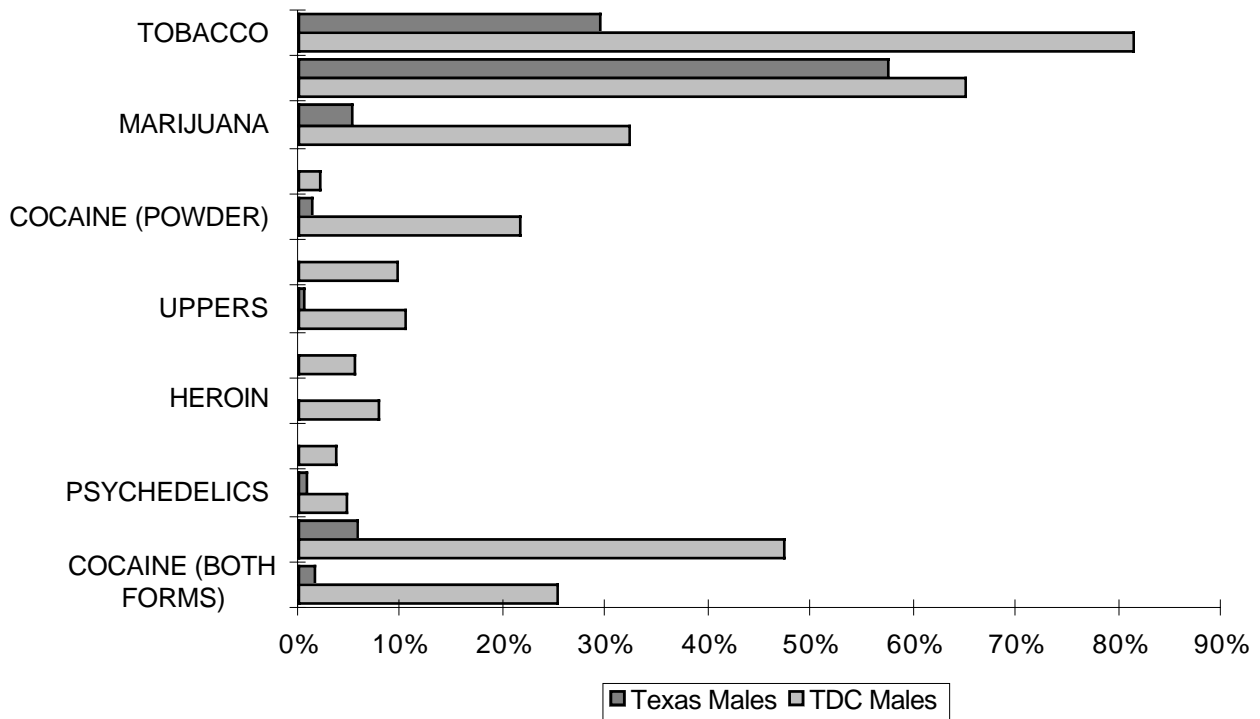


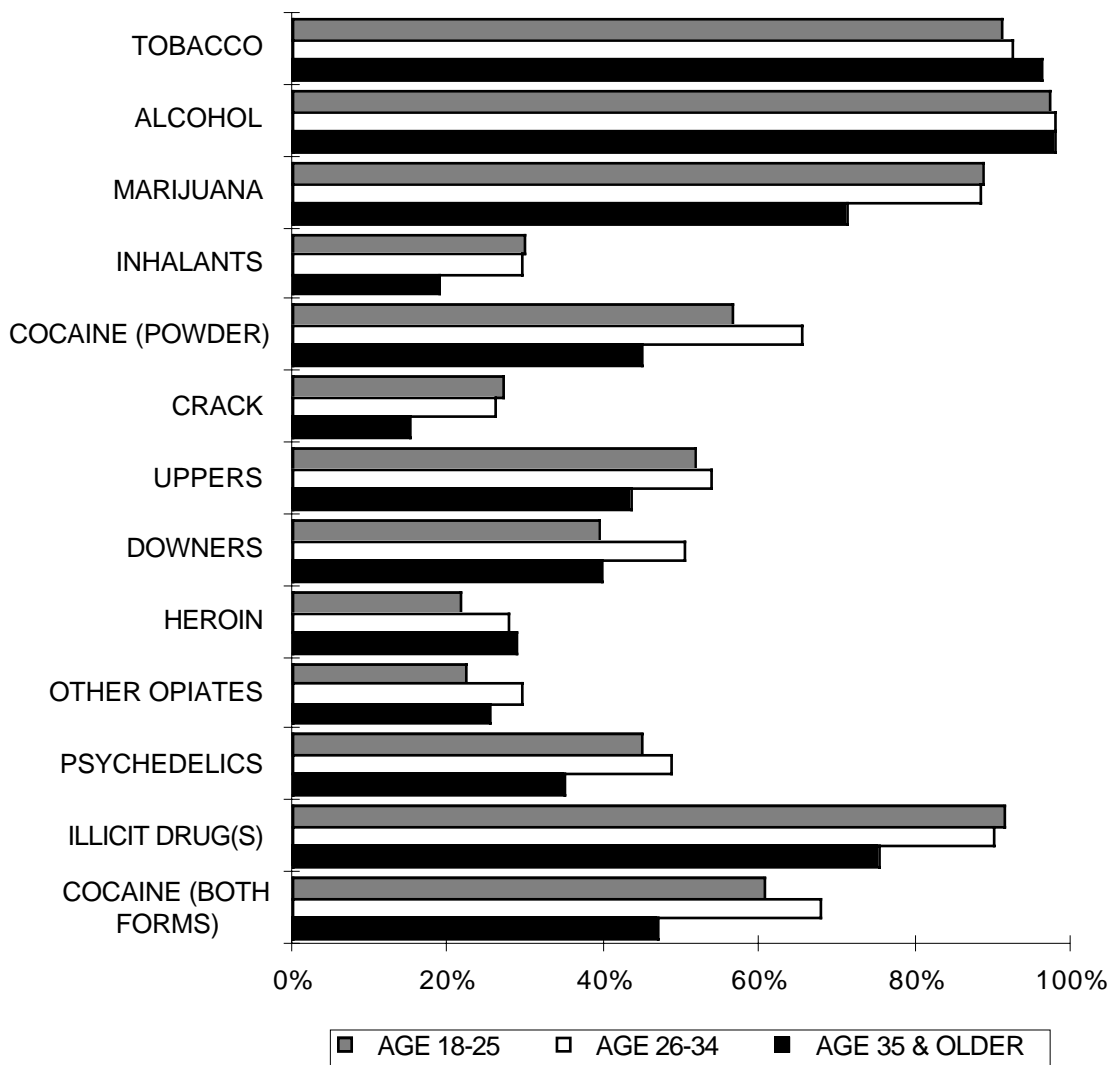
Table 3.1 Comparison of Substance Use:
TDC Male Inmates and Texas Male Adults

	Texas Males PAST MONTH	TDC Males PAST MONTH	RATIO OF DIFFERENCE	Texas Males EVER USED	TDC Males EVER USED	RATIO OF DIFFERENCE
TOBACCO	29.4%	81.3%	2.8	80.5%	92.8%	1.2
AGE 18-25	28.2%	80.3%	2.9	70.2%	91.1%	1.3
AGE 26-34	33.7%	82.1%	2.4	79.4%	92.6%	1.2
AGE 35 & OLDER	28.1%	82.1%	2.9	84.4%	96.2%	1.1
ALCOHOL	57.6%	64.9%	1.1	94.4%	97.6%	1.0
AGE 18-25	65.9%	65.4%	1.0	93.1%	97.2%	1.0
AGE 26-34	68.9%	67.0%	1.0	96.8%	97.8%	1.0
AGE 35 & OLDER	50.3%	62.1%	1.2	93.9%	97.9%	1.0
MARIJUANA	5.1%	32.3%	6.3	33.9%	84.2%	2.5
AGE 18-25	11.6%	43.1%	3.7	51.0%	88.6%	1.7
AGE 26-34	9.1%	29.9%	3.3	55.9%	88.2%	1.6
AGE 35 & OLDER	1.4%	18.7%	13.3	19.5%	71.1%	3.7
INHALANTS	**	2.1%	10.1	6.7%	27.2%	4.0
AGE 18-25	0.9%	3.6%	3.9	13.5%	29.7%	2.2
AGE 26-34	**	1.7%	11.0	9.7%	29.4%	3.0
AGE 35 & OLDER	**	**	**	3.3%	18.7%	5.7
COCAINE (POWDER)	1.4%	21.6%	15.5	12.3%	57.5%	4.7
AGE 18-25	5.1%	23.6%	4.6	18.8%	56.7%	3.0
AGE 26-34	1.4%	22.4%	16.3	23.5%	65.4%	2.8
AGE 35 & OLDER	**	16.7%	91.8	5.6%	44.9%	8.0
CRACK	**	9.6%	43.9	1.1%	23.7%	21.2
AGE 18-25	**	12.3%	31.9	1.9%	27.0%	13.9
AGE 26-34	0.5%	9.8%	21.8	2.6%	26.1%	10.0
AGE 35 & OLDER	**	5.1%	72.6	**	15.0%	57.5
UPPERS	0.6%	10.3%	16.0	15.6%	50.5%	3.2
AGE 18-25	1.6%	12.6%	8.1	22.0%	51.8%	2.4
AGE 26-34	0.8%	12.2%	14.5	25.1%	53.7%	2.1
AGE 35 & OLDER	**	3.4%	13.1	9.6%	43.6%	4.5
DOWNERS	**	5.6%	242.5	7.4%	43.8%	5.9
AGE 18-25	**	8.9%	N.A.	8.6%	39.4%	4.6
AGE 26-34	**	4.8%	48.3	14.4%	50.4%	3.5
AGE 35 & OLDER	**	1.3%	N.A.	4.3%	39.7%	9.3
HEROIN	**	7.8%	141.1	1.4%	25.7%	18.4
AGE 18-25	**	5.3%	N.A.	0.6%	21.7%	34.7
AGE 26-34	**	10.1%	42.0	1.9%	27.6%	14.3
AGE 35 & OLDER	**	8.1%	N.A.	1.4%	28.9%	20.2
OTHER OPIATES	**	3.7%	40.4	2.8%	25.6%	9.2
AGE 18-25	**	3.6%	12.6	3.2%	22.2%	6.9
AGE 26-34	**	4.5%	N.A.	5.3%	29.4%	5.6
AGE 35 & OLDER	**	2.6%	39.9	1.7%	25.2%	15.2
PSYCHEDELICS	0.7%	4.8%	6.8	10.1%	44.1%	4.4
AGE 18-25	2.2%	9.7%	4.3	16.9%	44.8%	2.7
AGE 26-34	0.7%	2.4%	3.4	18.2%	48.6%	2.7
AGE 35 & OLDER	**	0.9%	4.6	4.6%	34.8%	7.6
ILLICIT DRUG(S)	5.8%	47.2%	8.1	37.0%	86.9%	2.3
AGE 18-25	12.9%	55.7%	4.3	54.1%	91.4%	1.7
AGE 26-34	9.9%	47.6%	4.8	57.0%	90.0%	1.6
AGE 35 & OLDER	1.8%	33.2%	18.5	23.3%	75.3%	3.2
COCAINE (BOTH FORMS)	1.5%	25.2%	16.8	12.4%	60.4%	4.9
AGE 18-25	5.2%	28.5%	5.5	19.3%	60.7%	3.1
AGE 26-34	1.6%	26.3%	16.6	23.5%	67.9%	2.9
AGE 35 & OLDER	**	17.9%	70.9	5.6%	46.8%	8.3

** Less than 0.5%

On most drugs, the ratio increases with age category. For example, younger inmates (age 18 to 25) are about five times more likely to report current use of powdered cocaine than their counterparts in the non-incarcerated population, middle inmates (age 26 to 34) are 16 times more likely to report current powdered cocaine use, and older inmates (age 35 and over) are 92 times more likely to admit current powdered cocaine use. While this last difference is striking, it is primarily due to the fact that very few (less than .5 percent) adult males over the age of 35 are current users of powdered cocaine. One way of thinking about this result is that older inmates are disproportionately drawn from that very small segment of the older adult population which uses this illicit drug.

Fig 3.2.1 Lifetime Prevalence of Substances by Age of TDC Inmate, 1988



3.2 Age Differences in Prevalence of Use Among Inmates

3.2.1 Lifetime Prevalence

Younger inmates and middle inmates report similar lifetime prevalence for illicit drugs whereas older inmates report at lower rates (Figure 3.2.1); downers, heroin and opiates other than heroin are exceptions to this pattern. Middle inmates appear somewhat more likely to report lifetime use of downers and opiates other than heroin, and younger inmates appear less likely to report lifetime experience with heroin. These reporting patterns suggest that younger and middle inmates have been more exposed to illicit drugs than older inmates entering the TDC system. This pattern is similar in the general population (Spence *et. al.*, 1989). Differences in reported lifetime prevalence by age category of inmates are not significant for tobacco and alcohol.

3.2.2 Current Prevalence

Age reporting patterns on current use of illicit substances have two distributions (Figure 3.2.2). On most substances, current prevalence decreases with age; younger individuals are more likely to be active substance users among inmates and the general population (Spence *et. al.*, 1989). On a few substances (notably heroin), middle inmates report somewhat higher rates than other age groups. This suggests that either heroin use has a later age of first use than that of other drugs, or that younger substance users have become less willing to use this drug in recent years. There are no significant age differences in rates of current use of tobacco.

3.3 Racial/Ethnic Differences in Substance Use Among Inmates

3.3.1 Lifetime Prevalence

White inmates are more likely than other racial/ethnic groups to report lifetime use of most substances (Figure 3.3.1). Hispanics and Whites are almost equally likely to report lifetime use of inhalants at a rate significantly higher than Blacks. This pattern of reporting parallels that of the general population (Spence *et. al.*, 1989). The only substance where lifetime prevalence is most frequently reported by Blacks is crack cocaine.

3.3.2 Current Prevalence

Racial/ethnic differences in current use present a somewhat different picture. Whites are most likely to report current use of tobacco, uppers, opiates other than heroin, and illicit drugs in general. Hispanics are most likely to report past month use of alcohol. Hispanics and Whites are almost equally likely to report current use of inhalants, downers, and heroin at a rate significantly higher than Blacks. Blacks are most likely to report current use of crack cocaine and the combined category of cocaine. Uppers and crack cocaine are the substances with the largest difference in racial/ethnic current use reporting patterns.

Fig 3.2.2 Current Prevalence of Substances by Age of TDC Inmate

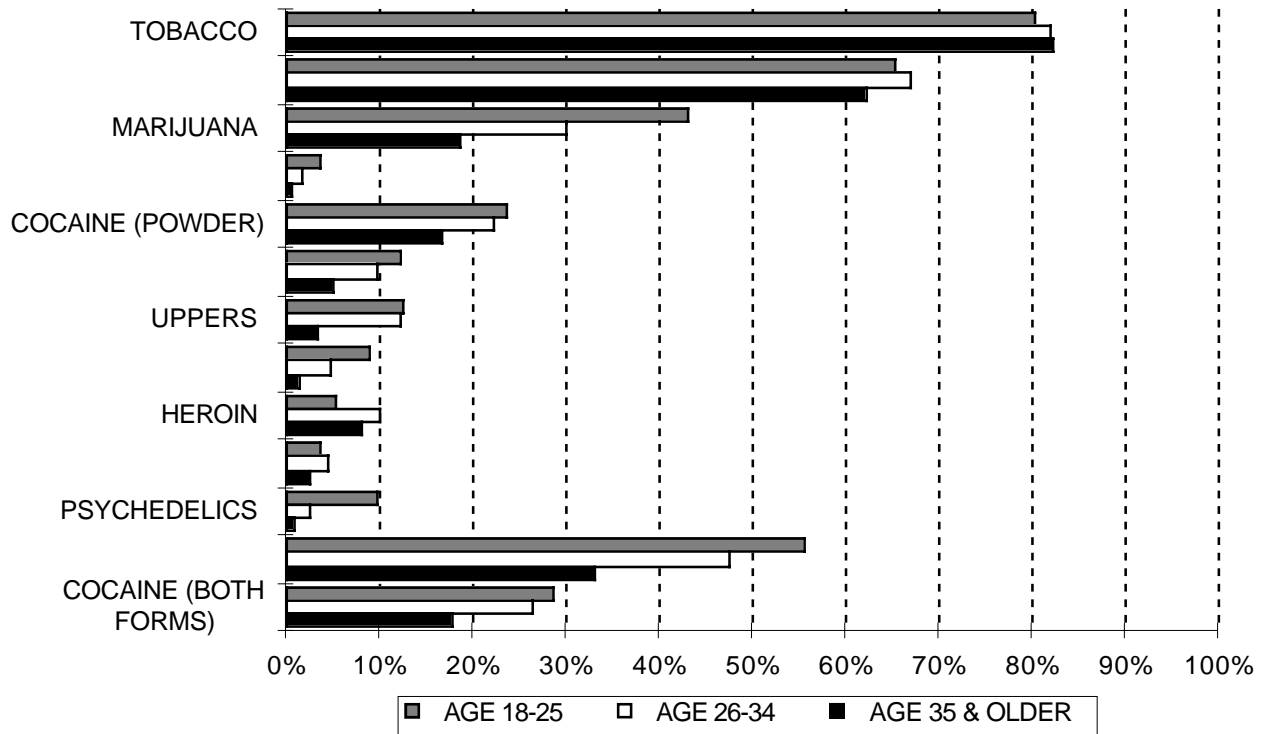
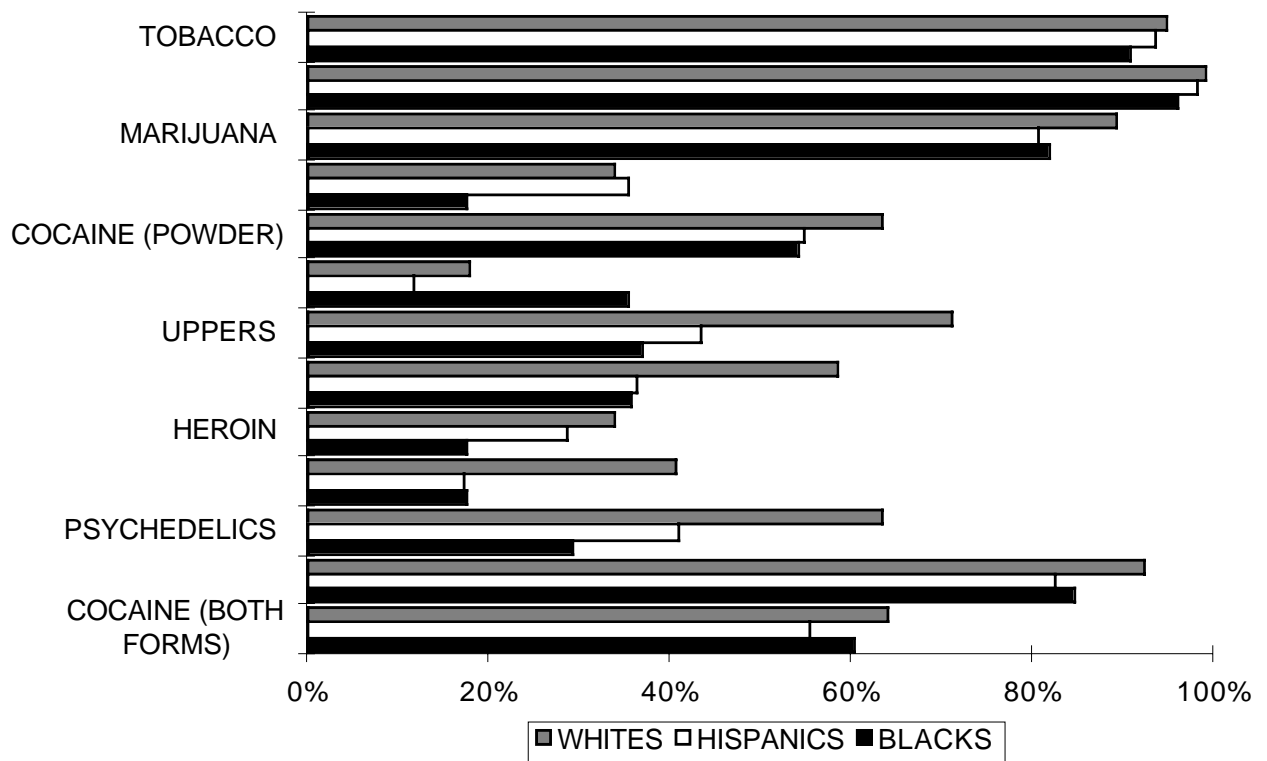


Fig 3.3.1 Lifetime Prevalence of Substances by Race/Ethnicity of TDC Inmate, 1988



3.4 Heavy Substance Use Among Inmates

Different patterns of substance use exist among users: some use only a few times; others may use over a protracted period of time, but in moderate amounts and relatively infrequently; still others are heavy users with respect to the quantity of drugs which are consumed or frequency of use. It can be anticipated that more intensive use will be associated with a variety of negative consequences. Therefore, it is useful to explore reports of heavy substance abuse among inmates.

There are no standard behavioral definitions for “heavy use.” Were such definitions available, heavy use would be measured differently on different substances because few measures are applicable across a wide range of drugs. One exception to this generalization is “frequency of consumption,” a measure applicable to any substance regardless of form (*e.g.* powder, pill, liquid, or leaf) or how it is taken. The following measures of heavy consumption are constructed such that most people will intuitively accept them as indicative of heavy use. Measures are set at high levels so that only a small percentage of respondents who use a given substance will report heavy use. The purpose of this measure is to pinpoint respondents who have more extreme patterns of use.

3.4.1 Alcohol

Although most Texans drink, only a minority are considered problem drinkers (Spence *et. al.*, 1989). In contrast, many inmates have severe alcohol problems. One mark of these problems is the amount inmates drink, or their **consumption pattern**.

Consumption patterns have three dimensions: prevalence of use, frequency of use and quantity of use. The first indicates the percentage that drink alcohol, the second summarizes how often alcohol is drunk, and the third indicates the amount consumed on occasions when alcohol is drunk. Inmates and adult Texans reporting consumption of 10 or more drinks in the past year and at least one drink in the past month were asked four questions to ascertain different aspects of their consumption patterns:

- 1. During the last 30 days you were on the street, on how many different days did you have one or more drinks?*
- 2. On the days that you drank during the last 30 days on the street, about how many drinks did you usually have a day? By a drink we mean the equivalent of a can of beer, a glass of wine or a shot of hard liquor.*

3. *During the last 30 days you were on the street, what is the most you had to drink on any one day?*
4. *During the last 30 days you were on the street, about how many days did you have five or more drinks on the same occasion? [If necessary for clarification: By occasion we mean at the same time or within a couple of hours of each other.]*

Presented in Table 3.4.1A-3.4.1C are some measures of heavy alcohol consumption derived from the questions above:

Col. 1 is percent reporting “**daily use.**” According to the NIDA definition, daily use is defined as consumption on 20 or more days in the past month.

Col. 2 is percent reporting “**typical excessive drinking.**” Typical excessive drinking is defined as more than 10 drinks on a typical drinking occasion.

Col. 3 is percent reporting “**binge drinking.**” Binge drinking is defined as drinking more than 10 drinks on at least one occasion in the past month.

Col. 4 is percent reporting “**frequent heavy drinking.**” Frequent heavy consumption is defined as drinking five or more drinks on more than 10 occasions in the past month.

For comparative purposes, data is presented for adult males. Also shown is a ratio which is computed by dividing adult male reports by inmate reports on each of the four measures.

Among inmates, there are age differences in heavy consumption (Table 3.4.1B). The percent reporting each of the four measures of heavy consumption decreases with age. Younger inmates appear more likely to be more frequent and heavier drinkers than other age groups. This consumption pattern parallels that found in the general population, but inmates of all age groups are more likely to be heavy drinkers than their non-incarcerated counterparts.

There are also differences in heavy consumption when broken out by race/ethnicity (Table 3.4.1C). Blacks report the lowest rates on all four measures, although rates are still very high compared to the general population.

While lifetime and current prevalence of alcohol use are virtually the same in inmates and the general population, inmates who drink are much heavier drinkers by all measures. Among inmates, there are also differences in consumption patterns: younger inmates report heaviest consumption and Hispanics are more likely to report typical heavy consumption.

Table 3.4.1A
Four Measures of Heavy Alcohol Consumption: TDC Male Inmates and Texas Male Adults

	Daily Use	Typical Excessive Drinking	Binge Drinking	Frequent Heavy Drinking
TDC Male Inmates	23.0%	19.7%	36.2%	23.1%
Texas Male Adults	7.1%	1.8%	8.5%	3.1%
Ratio: Inmate/Free-World Adults	3.2	10.9	4.3	7.5

Table 3.4.1B
Four Measures of Heavy Alcohol Consumption by Age: TDC Male Inmates, 1988

	Daily Use	Typical Excessive Drinking	Binge Drinking	Frequent Heavy Drinking
Younger Inmates	26.2%	25.1%	41.0%	25.8%
Middle Inmates	22.8%	19.5%	37.5%	23.7%
Older Inmates	19.7%	12.2%	27.0%	18.4%

Table 3.4.1C
Four Measures of Heavy Alcohol Consumption by Race/Ethnicity: TDC Male Inmates, 1988

	Daily Use	Typical Excessive Drinking	Binge Drinking	Frequent Heavy Drinking
White Inmates	26.5%	21.1%	40.3%	26.5%
Hispanic Inmates	23.5%	34.1%	50.4%	26.4%
Black Inmates	20.1%	11.1%	25.6%	18.6%

3.4.2 *Illicit Drugs*

More TDC inmates than adult male Texans use illicit drugs, and differences are most striking on drugs that are rarely used by the general population. Daily use of illicit drugs is one indication of addiction, and the cost of such habits may motivate criminal acts. Two questions on the TCADA survey pertain directly to these issues:

1. *On about how many different days did you use [name of substance] during your last 30 days on the street?*
2. *About how much money did the [name of substance] you used in the last 30 days you were on the street cost you?*

Presented in Table 3.4.2A are inmate reports of daily use (20 or more days in the past month) of eight illicit drugs. Shown on Table 3.4.2B is high-dollar expenditure (\$200 or more in the past month) for the same eight drugs. Responses are also broken out by age and race/ethnicity. Comparative data from the Texas adult male population is not presented because daily use and high-dollar spending are rarely reported by this group.

- * About 28 percent of inmates report daily use of one or more of the eight illicit drugs.
- * In their last month on the street, 23 percent of inmates spent at least \$200 for illicit drugs.
- * Illicit drugs most likely to be heavily used by inmates are marijuana, cocaine, amphetamines, and heroin.
- * Inmates reporting heavy use of illicit drugs are, except in the case of heroin, likely to be young; heavy heroin users appear to be somewhat older than users of other illicit substances. Heavy users of powdered cocaine are equally represented in all three age groups.
- * Heavy users of amphetamines are predominantly White: about 12 percent of White inmates report daily use.
- * Heavy users of crack cocaine are predominantly Black: about 7 percent of Black inmates report daily use and 9 percent spent \$200 or more in one month to acquire it.
- * There are very few inmates who are heavy users of downers, opiates other than heroin, or psychedelics.

Table 3.4.2A
Daily Use of Selected Drugs: TDC Male Inmates, 1988

	Powdered		Crack	Uppers	Downers	Heroin	Other Opiates	Psyche- delics	Any One Drug
	Marijuana	Cocaine							
All	14.8%	9.7%	3.1%	5.2%	0.7%	4.0%	0.8%	0.3%	27.8%
Age 18-25	21.3%	9.7%	5.3%	6.1%	0.8%	1.7%	0.3%	0.8%	33.8%
Age 26-34	12.4%	9.1%	2.4%	6.5%	0.5%	5.3%	0.7%	0.0%	26.1%
Age 35 & Older	7.7%	11.1%	1.3%	1.7%	0.4%	5.5%	1.7%	0.0%	20.4%
White	19.6%	9.5%	0.8%	12.0%	1.4%	4.6%	1.4%	0.5%	35.9%
Hispanics	18.0%	9.6%	0.4%	2.2%	0.4%	6.6%	0.4%	0.4%	28.1%
Blacks	9.0%	10.1%	6.6%	0.9%	0.2%	2.1%	0.5%	0.0%	20.8%

Table 3.4.2B
 Monthly Expenditure of \$200 or More for Illicit Drugs: TDC Male Inmates

	Marijuana	Powdered Cocaine	Crack	Uppers	Downers	Heroin	Other Opiates	Psychedelics	Any One Drug	Drugs combined
All	5.1%	11.6%	4.5%	3.5%	0.8%	3.6%	0.8%	0.4%	21.5%	22.6%
Age 18-25	9.4%	11.7%	6.1%	3.9%	0.8%	1.9%	0.8%	0.8%	24.7%	25.8%
Age 26-34	3.6%	11.3%	4.3%	4.6%	0.7%	4.8%	0.7%	0.0%	22.0%	23.0%
Age 35 & Older	1.3%	11.5%	2.1%	1.3%	0.4%	4.3%	0.9%	0.4%	15.3%	16.6%
White	8.7%	11.2%	1.4%	8.4%	1.9%	3.8%	1.6%	0.8%	25.0%	25.5%
Hispanics	4.4%	11.9%	1.3%	0.4%	0.0%	5.3%	0.4%	0.4%	19.3%	20.6%
Blacks	2.4%	12.1%	8.8%	1.0%	0.2%	2.6%	0.2%	0.0%	19.8%	21.2%

About 15 percent of inmates report daily use of **marijuana**. Younger inmates are more likely to report daily use than middle or older inmates, and Black inmates report daily use at lower rates than do Whites or Hispanics. Only about 5 percent of inmates reported spending \$200 or more for marijuana in the past month, compared to the much higher rate of those who use daily. This indicates that daily use of marijuana is less expensive to maintain than other drugs such as cocaine. Younger inmates report higher rates of high-dollar expenditure on marijuana than other age groups and White inmates higher rates than the other racial/ethnic groups.

Although they are different forms of the same substance, **powdered cocaine** and **crack cocaine** show distinct patterns of intensive use by inmates. About 10 percent of inmates report daily use of powdered cocaine, whereas only 3 percent report daily use of crack. High-dollar expenditure for powdered cocaine and crack cocaine are reported as 12 percent and 5 percent, respectively. Powdered cocaine and crack cocaine show age and racial/ethnic differences in patterns of use: intensive use of crack among inmates is primarily associated with being young and being Black, while intensive use of powdered cocaine is evenly distributed among inmates. Daily use and high-dollar expenditures for crack decrease sharply with age. In addition, about 7 percent of Black inmates report daily use of crack, and 9 percent report high-dollar expenditures on it. These rates are at least seven times greater than are reported by other racial/ethnic groups.

About 5 percent of inmates report daily use of **uppers** and 4 percent report high-dollar expenditures for such substances. Most daily users and high-dollar spenders are White and under the age of 35. Less than 1 percent of inmates reported daily use and high-dollar spending for **downers** (sedatives, hypnotics or tranquilizers). Because few inmates report intensive use of such substances, age and racial/ethnic differences in reporting patterns are difficult to ascertain.

Daily use of **heroin** is reported by 4 percent of inmate respondents, **other opiates** by only 1 percent. Younger inmates appear less likely than middle and older inmates to report daily use or high-dollar spending for heroin. This suggests that, contrary to illicit drug patterns previously described, heroin is more likely to be a problem for older inmates. Hispanics are slightly more likely than Whites to report intensive heroin use while Blacks report such activities at lower rates. It is difficult to ascertain age and race-ethnic differences in daily use of and high-dollar spending for other opiates because relatively few inmates report such behaviors.

Less than .5 percent of inmates report daily use of **psychedelic** drugs in the past month or spending more than \$200 for psychedelics in the past month. Only younger inmates and White inmates report daily use or high dollar spending for psychedelics at rates greater than .5 percent.

3.5 Problems Associated With Substance Use

The severity and range of problems caused by substance use are influenced by a number of factors: the characteristics of the substance (such as chemical composition, legal status, and cost), the characteristics of the user (such as age, health, genetic predisposition, and economic or social status), and the way a substance is used (dose, duration of use, context of use, and how it is taken). These factors interact and substance use becomes, to a greater or lesser degree, dysfunctional for many users. Since many inmates are clearly heavy users, one would expect that some inmates have experienced substance use problems in major areas of their life including physical and mental health, significant social relationships, and the ability to make an honest living.

For organizational purposes, reports of substance abuse problems are divided into alcohol problems and drug problems and results are discussed separately. However, the reader should not be misled by this convention into regarding these areas as unrelated: inmates are more likely to have both alcohol and drug problems, rather than just alcohol or drug problems alone.

3.5.1 Background

The National Institute on Alcohol Abuse and Alcoholism defines alcoholism as “dependency on alcohol” (NIAAA, *Alcohol & Health*, 1987); alcoholics cannot stop drinking despite the fact that alcohol causes numerous problems in their lives. The presence of many alcohol problems can suggest dependency, but cannot prove it. As an illustration, consider the relationship of age to alcohol consumption behaviors and alcohol problems.

Over the past 30 years, national and state surveys have consistently shown that younger drinkers drink in larger quantities, drink more often than their older counterparts, and report more alcohol problems. But as younger adults age, most moderate their drinking behavior, which indicates that they are not at that point dependent on alcohol; however, some will develop alcohol problems again later in their lives. Research has also shown that older adults reporting many alcohol problems are more likely to be dependent on alcohol; they find it very difficult to moderate or discontinue use of alcohol even when confronted with dysfunctional use patterns. Thus alcohol problems have different implications when reported at different points in life: they may point to a dysfunctional drinking pattern now and warn of dependency in the future, or may indicate present alcoholism.

The correct diagnosis of any particular case cannot be precise in this form of survey research. However, summary measures of substance-related problems are used as indirect indicators of the degree of dysfunction present. The three inclusive measures of problem severity utilized in this project are as follows:

Level One includes individuals reporting at least one problem associated with substance use during the past year. This category is non-specific and includes those with few, as well as those with many, substance-related problems.

Level Two includes individuals reporting three or more substance-related problems in the past year, a degree of severity which probably requires treatment. In the context of alcohol, such individuals are said to have “significant alcohol problems.” When associated with drugs, individuals are deemed to have “significant drug problems.” Most inmates with significant alcohol problems have significant drug problems as well, but this is not always the case.

Level Three includes individuals reporting five or more substance-related problems in the past year, a degree of substance problem severity which strongly indicates need for treatment. Such individuals have “severe alcohol problems” or “severe drug problems.”

The substance-related problem questions used in this project identify various negative consequences of substance abuse. Drawn from previous national and state surveys, these questions are similar to those used by treatment professionals to ascertain dysfunctional substance use patterns. A complete list of problem questions and survey protocols is presented in Appendix B.

Table 3.5.2A
Alcohol Problems Reported by TDC Male Inmates: Age and Race/Ethnicity

Problem Level	Inmates	Age			Race/Ethnicity		
		18-25	26-34	35+	Whites	Blacks	Hispanics
Any Alcohol Problems (one or more problems)	54.6%	58.7%	55.7%	47.2%	56.0%	49.1%	64.5%
Significant Alcohol Problems (three or more problems)	46.2%	49.9%	48.8%	37.0%	49.7%	38.9%	55.3%
Severe Alcohol Problems (five or more problems)	37.9%	41.0%	41.9%	26.8%	42.4%	29.2%	47.8%
Specific Problems							
Aggressive or cross while drinking	24.0%	24.7%	26.8%	17.9%	30.8%	18.9%	23.2%
Heated argument while drinking	29.8%	35.3%	31.3%	19.1%	36.0%	24.1%	31.6%
Didn't go to work because of hangover	15.6%	17.8%	18.4%	7.2%	15.5%	13.2%	20.6%
High or tight at work	19.5%	20.8%	21.1%	14.9%	20.2%	16.7%	24.1%
Lost or nearly lost job because of drinking	11.2%	11.1%	13.6%	7.2%	13.9%	7.1%	14.9%
Spouse says should cut down on drinking	28.1%	31.4%	27.5%	24.3%	30.2%	20.5%	39.5%
Relative says should cut down on drinking	28.8%	31.4%	30.6%	21.7%	32.2%	20.0%	40.8%
Friend(s) say should cut down on drinking	16.9%	18.1%	17.0%	15.3%	18.8%	11.3%	24.6%
Skipped meals while drinking	29.5%	31.4%	33.3%	20.9%	31.9%	22.4%	39.9%
Tossed down several drinks for quicker effect	29.6%	35.0%	32.1%	17.9%	33.8%	25.2%	32.0%
Afraid were or might become alcoholic	21.2%	22.2%	21.1%	19.6%	25.6%	13.2%	29.4%
Stayed drunk for two or more days	22.5%	27.8%	20.1%	19.1%	31.3%	11.1%	30.3%
Once started, difficult to stop before drunk	19.7%	21.4%	21.1%	14.9%	26.7%	10.6%	25.9%
Had blackout	29.7%	32.8%	31.3%	23.0%	35.1%	23.1%	34.2%
Snuck quick drink while no one was looking	19.9%	19.2%	23.0%	16.2%	19.1%	18.9%	23.7%
Often had drink first thing in the morning	20.3%	20.8%	21.1%	18.7%	22.9%	15.3%	25.9%
Hands shook quite a lot after drinking	14.5%	14.4%	15.6%	12.8%	18.5%	6.8%	22.8%
Got high or tight while drinking by one's self	34.0%	34.4%	37.8%	27.7%	36.0%	28.5%	42.1%
Kept on drinking after promising self not to	26.9%	27.8%	29.7%	21.7%	30.5%	20.3%	34.2%

3.5.2 Alcohol Problems

3.5.2.1 Overview

55 percent of inmates report at least one alcohol problem in the past year, close to one-half have “significant alcohol problems,” and 38 percent have “severe alcohol problems” (Table 3.5.2A).

- * Older inmates are significantly less likely to have “significant” or “severe” alcohol problems than younger or middle inmates. However, as explained above, older individuals reporting the same number of problems as younger individuals are more likely to be diagnosed as alcoholic.
- * Hispanics are significantly more likely than other racial/ethnic groups to be have “significant” (55 percent) or “severe” alcohol problems (48 percent), an observation which is consistent with heavy drinking patterns previously presented.
- * The most frequently reported alcohol problem among inmates was “getting high or tight while drinking alone;” just over one-third of inmates experienced this behavior in the past year.

3.5.2.2 Frequently Reported Alcohol Problems

Problems reported by many respondents indicate the effect of age and racial/ethnic differences in problem reporting. A frequently reported problem is defined as one which is reported by at least one-third of respondents of a given age or racial/ethnic group.

Among younger inmates, problems frequently reported include “engaging in a heated argument while drinking,” “tossing down several drinks for a quicker effect,” and “getting high or tight while drinking by one’s self.” Middle inmates frequently reported “skipping a number of meals while drinking” and “tossing down several drinks.” No alcohol problem is reported by as many as one-third of older inmates, although the most common problem among this group is “drinking by one’s self,” reported by 28 percent.

More than one-third of Whites reported “heated arguments while drinking,” “tossing several drinks for quicker effect,” “being unable to remember things done while drinking” and “getting high or tight by one’s self,” a complex of problems almost identical to that reported by younger inmates. No single alcohol problem is reported by as many as one-third of Black inmates, but the most common problem is “getting high or tight by one’s self,” reported by 29 percent. Hispanic inmates report six alcohol problems at high rates, two of which involve reactions of family to inmate drinking patterns. This highlights both that family ties are important to Hispanic inmates and that alcohol abuse appears to disrupt these important social relationships.

3.5.2.3 Comparison to Alcohol Problems of Adult Male Texans

The comparisons between inmate and adult males on Table 3.5.2B are computed by dividing inmate reports of alcohol problems by a comparable group of non-incarcerated males. Interpretation of this ratio is straightforward: inmates are [ratio] times more likely than their adult male counterparts to report [problem or measure].

- * Inmates report all 19 alcohol problems at much higher rates than adult males.
- * Inmates are about twice as likely as adult males to report one or more alcohol problems, three times more likely to have “significant alcohol problems” and five times more likely to have “severe alcohol problems.”
- * A major difference between alcohol problems suffered by inmates and adult males is that inmates have an excess of work-related drinking problems: three of the six problems that have the highest ratio of difference relate directly to behavior at work. Thus, alcohol problems appear to be a greater impediment to keeping employment for inmates than for males in the general population.

Table 3.5.2B
RELATIVE PROBABILITY OF REPORTING ALCOHOL PROBLEMS
A Comparison of TDC Male Inmates to Texas Male Adults

Problem Level	All	Age			Race/Ethnicity		
	Inmates	18-25	26-34	35+	Whites	Blacks	Hispanics
Any Alcohol Problems (one or more problems)	1.9	1.4	1.5	2.3	2.0	1.8	2.0
Significant Alcohol Problems (three or more problems)	3.2	1.9	2.9	4.0	3.9	2.5	2.9
Severe Alcohol Problems (five or more problems)	5.4	3.0	5.1	6.2	7.2	3.5	4.6
Specific Problems							
Aggressive or cross while drinking	3.2	1.8	2.8	4.1	4.3	2.8	2.6
Heated argument while drinking	5.1	2.9	4.1	6.2	6.6	4.1	3.8
Didn't go to work because of hangover	7.3	3.4	7.4	7.7	8.1	8.7	6.6
High or tight at work	9.1	4.6	6.4	16.6	12.6	5.8	6.5
Lost or nearly lost job because of drinking	18.6	11.8	16.7	17.9	26.5	9.1	16.3
Spouse says should cut down on drinking	3.0	2.9	2.5	3.0	4.0	1.8	2.6
Relative says should cut down on drinking	4.4	2.5	4.4	4.9	6.4	2.2	3.5
Friend(s) say should cut down on drinking	6.0	3.6	6.8	7.0	9.3	2.3	5.0
Skipped four or more regular meals	5.3	3.2	4.6	6.0	7.2	2.7	5.0
Tossed down several drinks for quicker effect	3.5	1.6	3.3	4.9	4.3	3.8	2.9
Afraid were or might become alcoholic	4.2	2.9	3.3	5.3	5.6	2.9	4.0
Stayed drunk for two or more days	9.8	4.6	6.7	23.6	14.6	4.9	9.7
Once started, difficult to stop before drunk	4.7	3.0	3.2	6.8	7.1	4.2	3.9
Had blackout	2.8	1.7	2.6	3.4	3.5	2.3	2.8
Snuck quick drink while no one was looking	4.8	2.5	5.8	5.2	5.1	3.2	4.5
Often had drink first thing in the morning	12.2	8.5	13.9	12.9	20.5	4.6	11.5
Hands shook quite a lot after drinking	7.1	3.3	5.9	12.1	10.3	5.4	6.6
Got high or tight while drinking by one's self	3.8	3.8	3.4	3.5	3.8	3.2	5.1
Kept on drinking after promising self not to	4.2	2.6	4.2	4.6	5.8	2.1	4.0

3.5.3 Drug Problems Among Inmates

3.5.3.1 Overview

Inmates responses to drug problem questions are summarized in Table 3.5.3A.

- * 53 percent of inmates reported at least one of the seventeen drug problems in the past year.
- * 44 percent reported “significant drug problems” and 37 percent reported “severe drug problems.”
- * About 50 percent of those under the age of 35 have at least “significant drug problems,” and over 40 percent have “severe drug problems.”
- * Older inmates report drug problems at lower rates; about 30 percent report “significant drug problems,” and about one-quarter report “severe drug problems.”
- * The severity of drug problems appears highest among Whites: almost one-half reported “severe drug problems,” compared to one-third for Blacks and Hispanics.
- * The drug problem most often reported by inmates is “feeling nervous and anxious,” reported by 37 percent.

3.5.3.2 Frequently Reported Drug Problems

Frequently reported drug problems are defined as those reported by at least one-third of inmates. Drug problems reported by more than one-third of younger and middle inmates include the following: “arguments or fights with family and friends,” “feeling nervous or anxious,” “feeling suspicious or distrustful of people,” “trouble with the police,” and “skipping four or more regular meals.” In addition, more than one-third of younger inmates admit “feeling irritable and upset” due to drug use. No single drug problem was reported by as many as one-third of older inmates, although the problem most often reported by this age group (29 percent) is “trouble with the police.”

The problems described above for younger and middle inmates are also frequently reported by White inmates. No single problem is reported by as many as one-third of Black or Hispanic inmates. The problem most frequently reported by Blacks (32 percent) is “trouble with the police.” Hispanics (33 percent) reported most often “feeling suspicious or distrustful of people.”

Table 3.5.3A
Drug Problems Reported by TDC Male Inmates: Age and Race/Ethnicity

Problem Level	Inmates	Age			Race/Ethnicity		
		18-25	26-34	35+	Whites	Blacks	Hispanics
Any Drug Problems (one or more problems)	53.2%	60.1%	55.5%	38.3%	60.9%	48.6%	50.0%
Significant Drug Problems (three or more problems)	44.1%	50.1%	46.7%	30.2%	54.1%	38.4%	39.0%
Severe Drug Problems (five or more problems)	37.4%	43.8%	39.0%	24.3%	48.1%	31.1%	32.0%
Specific Problems							
Became depressed or lost interest in things	27.6%	31.5%	29.6%	17.9%	32.6%	25.4%	23.7%
Had arguments or fights with family/friends	29.7%	34.7%	33.8%	15.0%	40.6%	23.2%	24.2%
Trouble on job	17.0%	20.3%	19.0%	7.7%	22.1%	13.2%	16.1%
Driven unsafely	17.3%	18.6%	19.3%	11.5%	25.8%	11.2%	15.2%
Blackout because of drugs	20.4%	26.1%	21.0%	10.7%	24.7%	17.4%	19.2%
Felt completely alone or isolated	26.7%	31.2%	29.1%	16.7%	37.3%	19.3%	23.2%
Felt nervous and anxious	37.5%	43.0%	39.7%	25.6%	49.2%	30.8%	31.7%
Drug-related health problems	15.3%	14.1%	17.5%	14.2%	19.9%	13.8%	11.2%
Difficulty thinking clearly	26.3%	32.7%	25.7%	18.9%	33.1%	22.4%	22.8%
Drug-related money problems	25.4%	26.7%	27.7%	19.7%	31.2%	23.0%	20.7%
Felt irritable and upset	29.5%	33.5%	30.4%	22.2%	40.1%	24.0%	22.3%
Done less work than usual	22.3%	22.1%	26.8%	14.1%	26.2%	19.1%	21.9%
Felt suspicious and distrustful of people	35.9%	43.3%	36.7%	23.9%	44.5%	30.3%	32.6%
Trouble with the police	34.1%	35.8%	36.7%	28.6%	40.9%	32.3%	26.8%
Skipped four or more regular meals	32.7%	35.1%	37.9%	20.5%	43.4%	24.9%	30.0%
Found it harder to handle problems	24.1%	25.5%	27.1%	17.6%	31.0%	19.8%	20.5%
Sought emergency help	9.3%	10.0%	10.8%	6.0%	14.6%	5.4%	8.0%

Table 3.5.3B
RELATIVE PROBABILITY OF REPORTING DRUG PROBLEMS:
 A Comparison of TDC Male Inmates to Texas Adult Males, 1988

Problem Level	Inmates	Age			Race/Ethnicity		
		18-25	26-34	35+	Whites	Blacks	Hispanics
Any Drug Problems (one or more problems)	10.8	4.7	8.4	22.0	12.2	8.6	9.7
Significant Drug Problems (three or more problems)	16.5	7.6	10.5	45.6	19.4	9.9	20.0
Severe Drug Problems (five or more problems)	24.8	10.1	16.8	96.2	35.1	11.6	21.7
Specific Problems							
Became depressed or lost interest in things	19.9	9.1	16.7	32.2	24.2	11.5	19.7
Had arguments or fights with family/friends	19.8	8.1	15.7	47.9	23.0	18.0	26.0
Trouble on job	19.7	7.7	14.8	69.9	22.2	12.3	36.8
Driven unsafely	14.0	6.0	7.9	92.2	17.8	6.1	43.0
Blackout because of drugs	15.7	6.8	12.8	32.9	23.0	6.4	11.5
Felt completely alone or isolated	17.9	6.8	14.3	64.2	23.3	9.0	27.4
Felt nervous and anxious	15.5	6.1	11.2	59.0	19.2	10.8	16.3
Drug-related health problems	18.8	7.7	19.3	31.7	23.2	10.7	18.9
Difficulty thinking clearly	12.8	5.9	8.7	34.6	16.0	10.8	10.3
Drug-related money problems	34.7	17.0	18.3	139.0	58.4	11.5	22.1
Felt irritable and upset	19.3	8.3	12.3	67.2	24.2	15.6	19.3
Done less work than usual	22.0	7.7	16.0	104.4	29.0	14.0	15.3
Felt suspicious and distrustful of people	23.6	12.6	15.1	45.2	32.0	10.9	22.5
Trouble with the police	50.9	29.6	35.2	83.0	62.2	39.3	34.5
Skipped four or more regular meals	34.5	20.1	18.1	90.0	52.4	16.5	23.5
Found it harder to handle problems	35.2	11.7	33.2	124.4	59.1	12.0	30.0
Sought emergency help	29.0	16.4	24.1	34.9	37.9	14.8	67.5

3.5.3.3 Comparisons to Drug Problems of Adult Male Texans

Presented in Table 3.5.3B is a comparison of male inmate and adult male drug problems and drug severity measures.

- * Inmates are 11 times more likely than adult males to report at least one of the 17 drug problems, 17 times more likely to report “significant drug problems,” and 25 times more likely to report “severe drug problems.”
- * Inmates were over 50 times more likely to report “trouble with the police over drugs” in the past year than adult males.
- * There are three other problems reported by inmates in excess of 30 times the rate of adult males: “finding it harder to handle problems,” “skipping four or more regular meals,” and “drug-related money problems.” Three other problems are reported at rates in excess of 20 times those reported by adult males: “seeking emergency help,” “feeling suspicious or distrustful of people,” and “doing less work than usual.”
- * Inmates tend to have drug-related money problems at high rates as compared to males in the adult male population.

3.5.4 Multiple Substance Use Problems

Over the past two decades polydrug abuse has become common and, for individual cases, it has become increasingly difficult to specify a primary drug of abuse. Moreover, treatment programs tend to stress the importance of substance-free lifestyles to maintaining successful recovery, regardless of whether the original problem was primarily associated with alcohol or with drugs.

- * Among inmates, alcohol and drug problems are interrelated; the same individuals tend to report both kinds of problems, often at similarly high levels of severity.
- * 72 percent of inmates report substance use problems, regardless of whether these problems originated from alcohol or from drugs (Figure 3.5.4A), and a majority (56 percent) report five or more problems with alcohol and/or drugs.

Fig 3.5.4A Number of Substance-Related Problems Reported by TDC Male Inmates

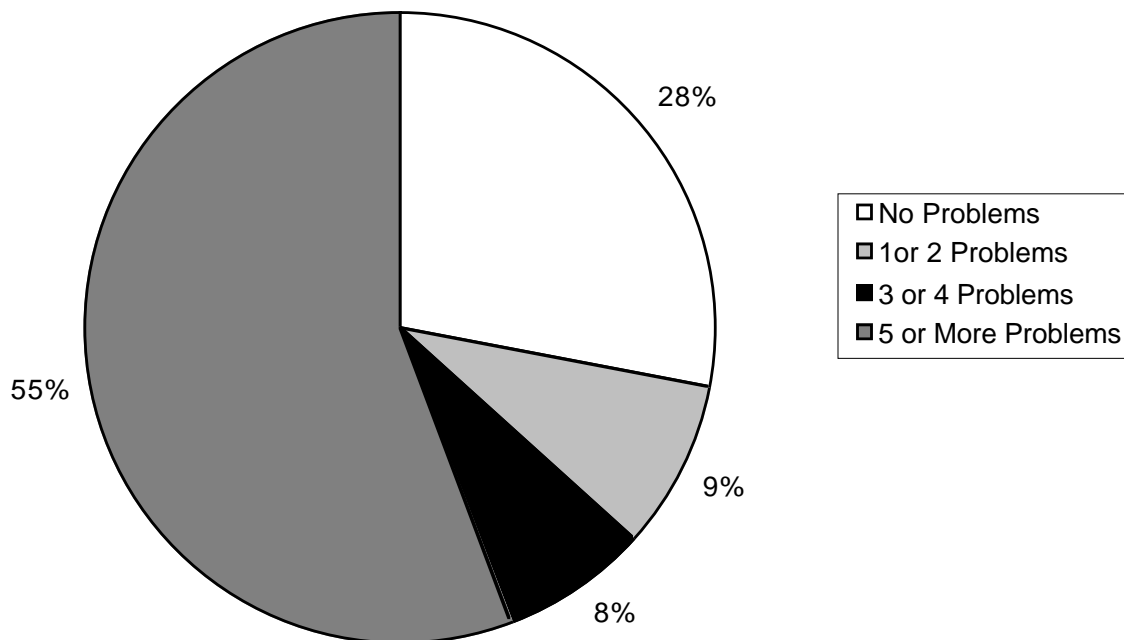
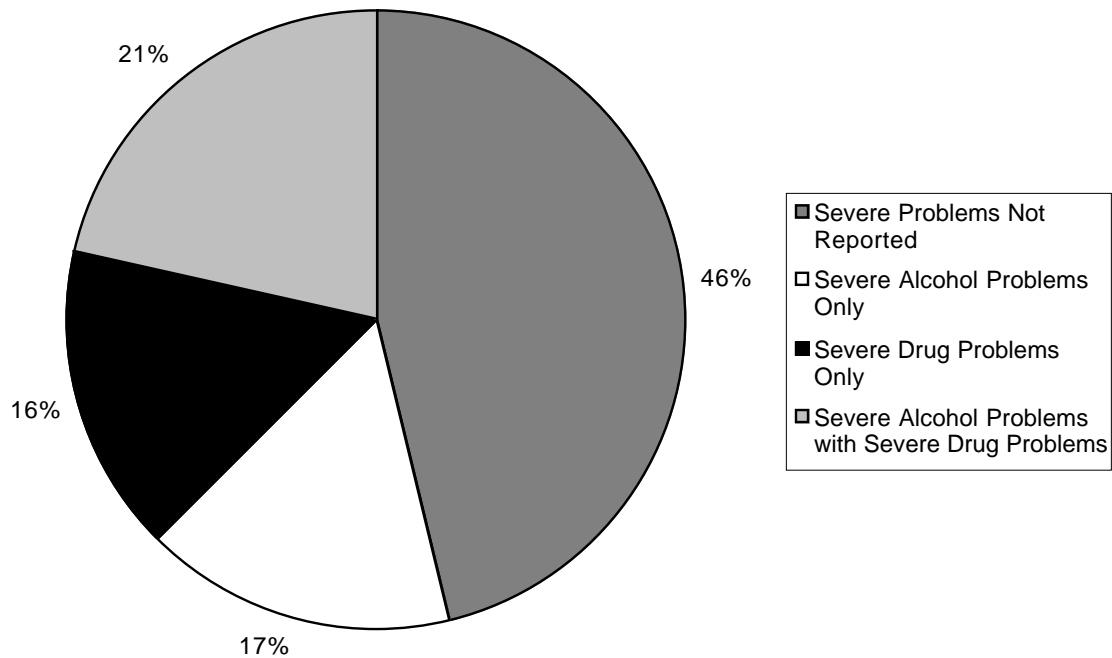


Fig 3.5.4B Percent Inmates Reporting Severe Problems with Alcohol and/or Illicit Drugs



- * Inmates are almost twice as likely to report both alcohol and drug problems than to report alcohol or drug problems alone; about 36 percent reported both alcohol and drug problems in the past year.
- * 63 percent of inmates reported three or more problems associated with alcohol or with drugs; 28 percent of inmates have “significant alcohol problems” and “significant drug problems.”
- * Some 54 percent of inmates reported five or more problems associated with alcohol or with drugs; 21 percent have “severe alcohol problems” and “severe drug problems” (Fig 3.5.4B).

IV. AVAILABILITY AND USE OF ILLICIT SUBSTANCES

The past decade has been marked by two seemingly contradictory drug-use trends. According to NIDA, “Current use (past month) of illicit drugs continued a decreasing trend which began in 1979 and accelerated between 1985 and 1988.” (USDHHS, 1989) Yet, media reports have focused on increasingly powerful international drug cartels, drug-related gang violence, and drug-related crime. The public has responded by identifying illicit drug use as the most serious problem facing the nation today. It is difficult to isolate a single cause for this apparent contradiction, but one possibility is an increasing divergence between the characteristics of drug users and non users. These are correlates of this hypothesis:

1. **Drug users have become younger** and therefore less able to handle the financial, psychological, social and physiological consequences of usage;
2. **Drug usage has become increasingly concentrated within a social and economic underclass.** Compared to more affluent drug users, such disadvantaged individuals have fewer resources with which to handle their addictions, or to pay for them. Accordingly, they are more likely to come to the attention of public treatment agencies or the criminal justice system.
3. **Current drug users take different, more varied, more addictive and possibly more expensive mixtures of drugs than were available in the past.**

4.1 Background

The TCADA survey project covered two populations with strikingly different demographic and social characteristics: inmates and adults in the general population. As has already been shown, inmates entering the prison system have a number of demographic characteristics which suggest that they are disproportionately drawn from disadvantaged populations. Both inmates and adult males were asked two questions about availability and use of selected substances:

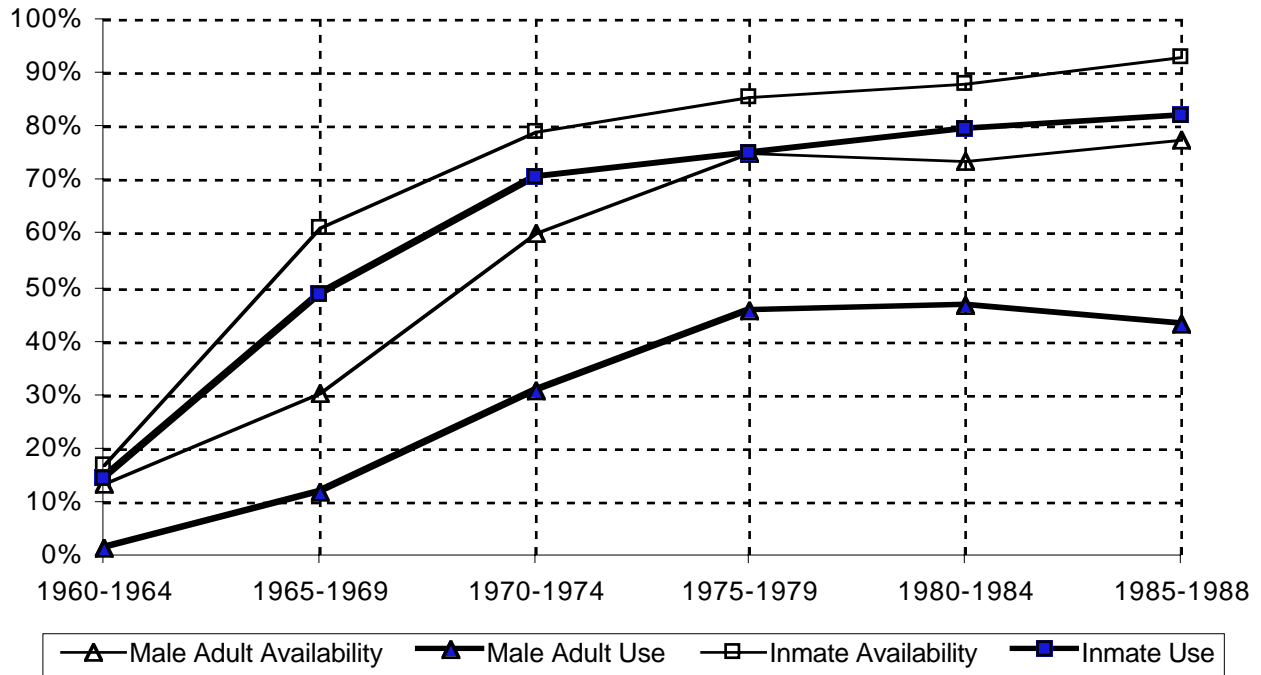
1. *About how old were you when you first had a chance to try [name of substance]?*
2. *About how old were you the first time you actually tried [name of substance]?*

The analysis is constructed to discover four things about inmate and adult male drug availability and use patterns: (1) Are inmates disproportionately drawn from populations who are exposed to drugs at an earlier age? (2) Are inmates more susceptible to beginning drug use than adult males? (3) Have patterns of availability and use reported by inmates and adult males diverged through time? and (4) Have there been changes in the availability and use of different drugs through time? Differences between the inmate and adult males are sufficiently large and consistent to make some general trend comparisons.

4.2 Availability and Use of Marijuana

Shown in Figure 4.2 is a comparison of availability and use of marijuana among adult males and inmates. Shown along the base of the graph are ranges of years in which respondents turned 18. For example, responses of those turning 18 between 1960 and 1964 are shown at the far left side of the graph. When these surveys were taken some 24 to 28 years later (1988), these respondents

Fig 4.2 Texas Adult Male and TDC Inmate Availability and First Use of Marijuana by Age 18, by Year of 18th Birthday



are between 41 and 46 years of age. Among adult male respondents of this age, about 12 percent reported that they had the opportunity to try marijuana by the time they were 18 but only about 1 percent had actually done so. In the inmate sample, about 18 percent of this age group report an opportunity to try marijuana by age 18 and about 16 percent report doing so.

Between the years of 1965 and 1974, reported availability and use of marijuana rises sharply for both adult males and inmates. After 1975, availability and use by age 18 levels off. These reports are consistent with known historical trends; marijuana actually did become more widely available and popular among youth in the late 1960s and early 1970s (NIDA, *National Survey*, 1986).

The gap between availability and first use may be thought of as a measure of resistance to initiating drug use. Notice that among inmates, this gap is much smaller at all points in time; inmates are more likely to use marijuana around the time they are first exposed to it. Of inmates turning 18 after 1985, for example, 93 percent report an opportunity to use marijuana by that age, while 82 percent report actually having tried it by that age; this represents a difference of just over 10 percentage points. For the same age cohort in the general population the difference between availability (87 percent) and use (43 percent), 44 percentage points, is much larger. Thus, it appears that adult males have been more resistant than inmates to the increased availability of

marijuana since 1985. Examination of other time periods leads to the generalization that not only has marijuana been more widely available at a younger age to inmates, but that inmates are more likely to initiate use of this drug at a young age when it is available.

While these results confirm a well-documented historical trend -- a rapid rise in availability and use of marijuana among youth in the late 1960s and early 1970s -- other drugs reflect more recent changes in broad patterns of availability and use.

4.3 Availability and Use of Cocaine

Cocaine presents a different pattern of availability and use through time than does marijuana (Figure 4.3A). Very few inmates or adult males report availability or use of this substance by age 18 between 1960 and 1964. For both groups, availability of powdered cocaine appears to increase steadily through time. However, among adult males, the percentage who initiated use of this substance appears to stabilize after 1980, even as availability continued to increase. One reasonable interpretation of this is that Texas male youth have become somewhat more resistant to the use of powdered cocaine even though it has become more widely available. However, the percentage of inmates using powdered cocaine by age 18 continued to increase after 1985. This distribution is consistent with the hypothesis that gaps are widening between the drug use of population classes.

Smokable cocaine in the form of crack is known to be of somewhat more recent origin than powdered cocaine (Figure 4.3B). Notice that crack cocaine first became available to inmates and Texas males 18 and under between 1980 and 1984. However, reports of availability and use after 1984 increased sharply, particularly among inmates. Over 30 percent of inmates who turned 18 after 1984 reported the opportunity to try crack cocaine, and about 15 percent reported actually doing so. As with powdered cocaine, the gap between use in the adult male population and inmates appears to increase through time.

Among Black populations, the slope of increase in availability and use of crack cocaine is reminiscent of the increase in use of marijuana by the general population during the late 1960s and early 1970s (Figure 4.3C; cf. Figure 4.2). Of Black inmates who turned 18 after 1984, over 40 percent report an opportunity to try crack cocaine. Some 20 percent report actually using crack cocaine by this age. Considering the recent rapid rise in availability and use of crack cocaine among youth, it can reasonably be expected that this drug will prove to be even more problematic in the near future.

Fig 4.3A Texas Male Adult and TDC Inmate Availability and First Use of Powdered Cocaine by Age 18, by Year of 18th Birthday

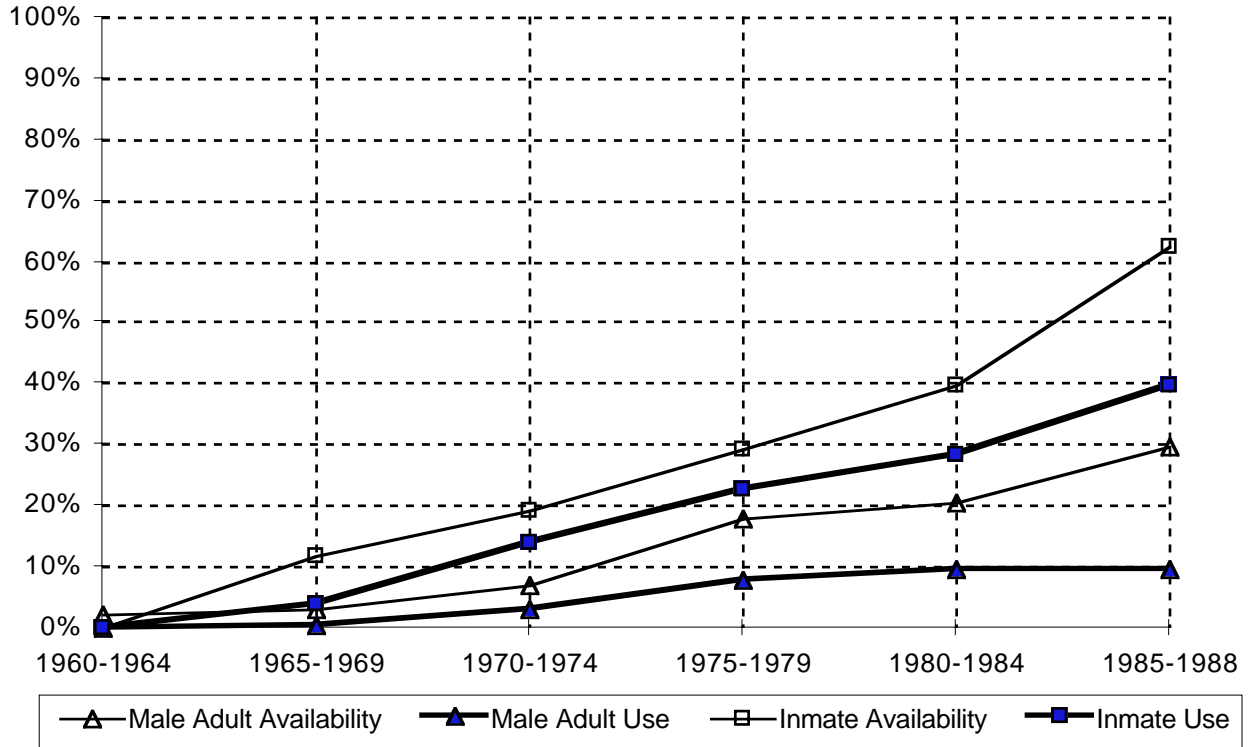


Fig 4.3B Texas Male Adult and TDC Inmate Availability and First Use of Crack Cocaine by Age 18, by Year of 18th Birthday

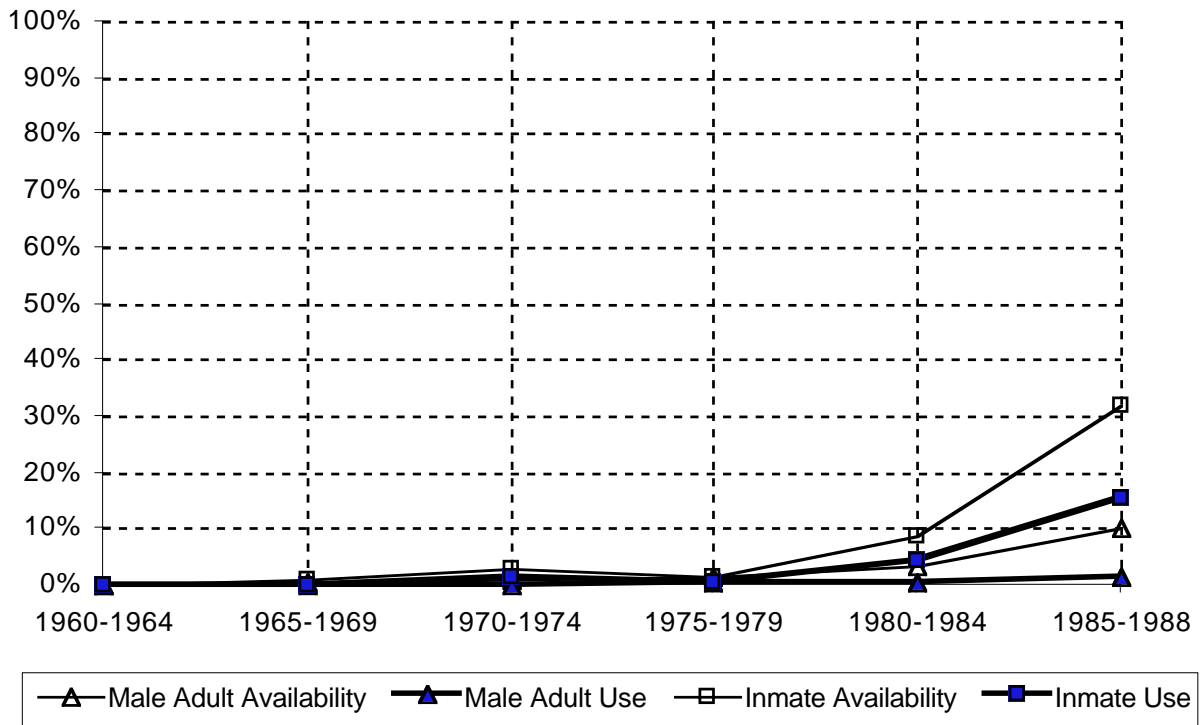
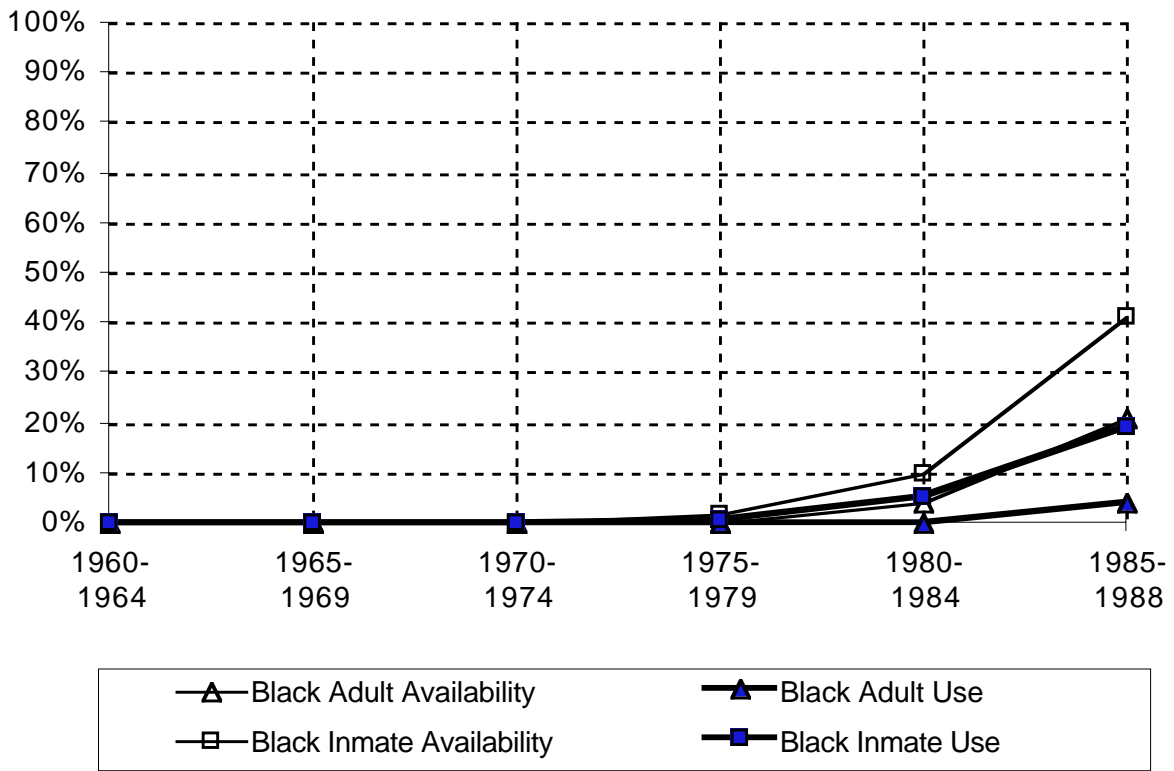


Fig 4.3C Texas Black Adult and TDC Black Inmate Availability and First Use of Crack Cocaine by Age 18, by Year of 18th Birthday



4.4 Availability and Use of Amphetamines

As with powdered cocaine, the reported availability and initiation of amphetamine use by age 18 increased among inmates throughout the period beginning in 1960, but leveled off and actually appears to decrease among adult males who turned 18 after 1984 (Figure 4.4A). Amphetamines appear more available and widely used by Whites than Hispanics or Blacks (Figure 4.4B). Of White inmates who turned 18 after 1984, 80 percent report availability and 65 percent report use of amphetamines by that age.

Fig 4.4A Texas Male Adult and TDC Male Inmate Availability and First Use of Amphetamines by Age 18, by Year of 18th Birthday

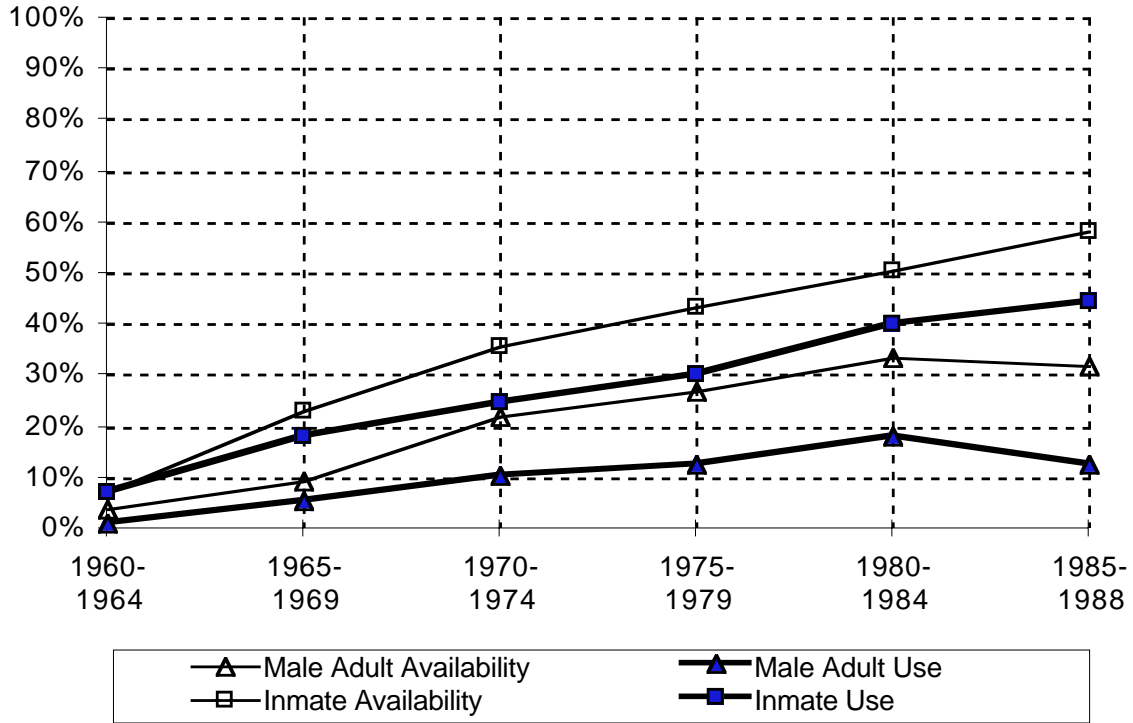
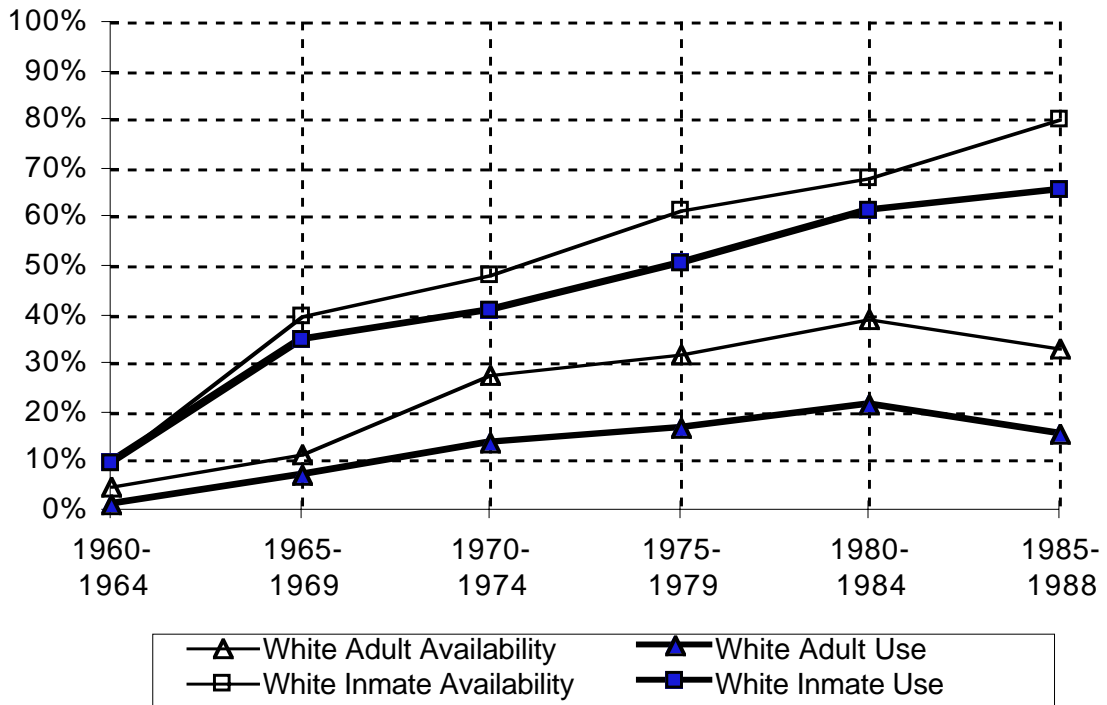


Fig 4.4B Texas White Adult and TDC White Inmate Availability and First Use of Amphetamines by Age 18, by Year of 18th Birthday



4.5 Availability and Use of Heroin

Heroin also has a distinct pattern of availability and use through time (Figure 4.5A). Notice that in both inmate and adult male samples, reported availability and use by age 18 have a peak in the 1970 to 1974 period. Perhaps not coincidentally, this period corresponds to the period of maximal U.S. involvement in the Viet Nam War. There is a sharp increase in reported availability of heroin by inmates who turned 18 after 1985 accompanied by a more modest rise in use by this group.

Much of the recent increase in availability and use of heroin is reported by Hispanic inmate respondents (Figure 4.5B). About 49 percent of Hispanic inmates who turned 18 after 1984 reported an opportunity to use heroin; some 25 percent report actually doing so by that age. Interestingly, these reports correspond well to law enforcement surveillance reports of an increasing availability of “Black Tar” heroin from Mexico after 1984 (TCADA, *Drug Abuse Trends*, 1987).

Fig 4.5A Texas Male Adult and TDC Male Inmate Availability and First Use of Heroin by Age 18, by Year of 18th Birthday

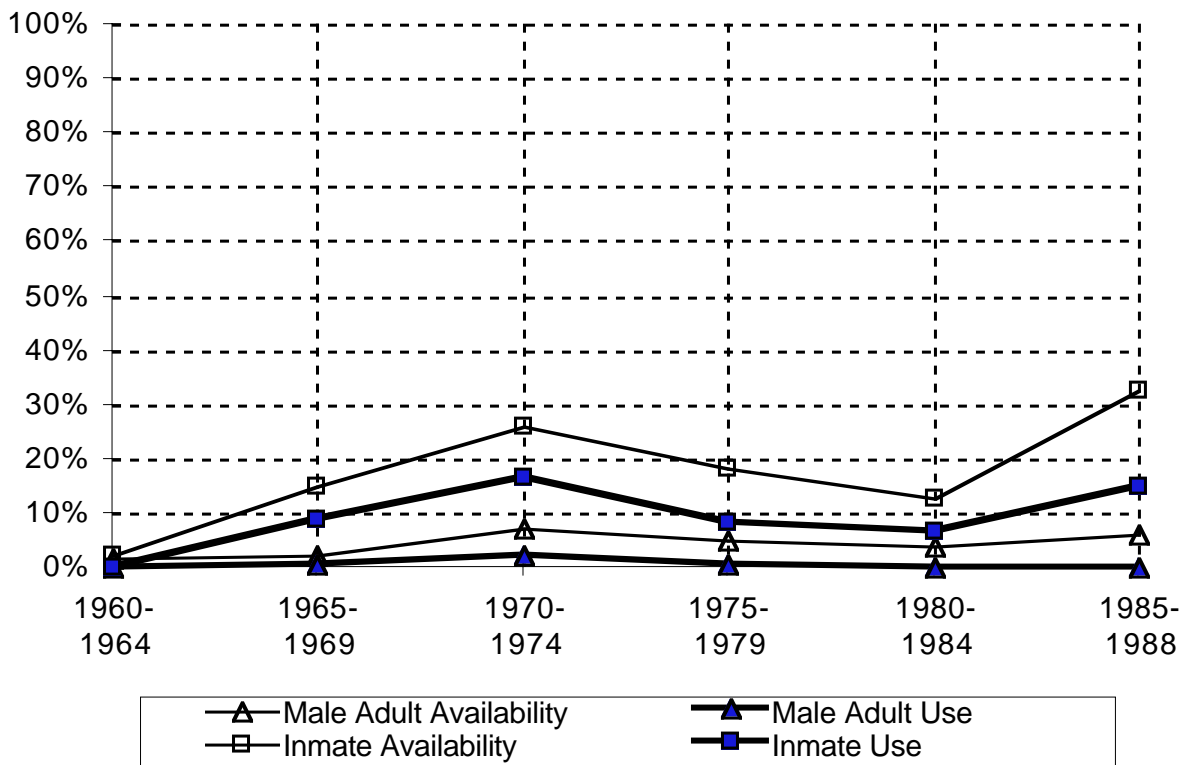
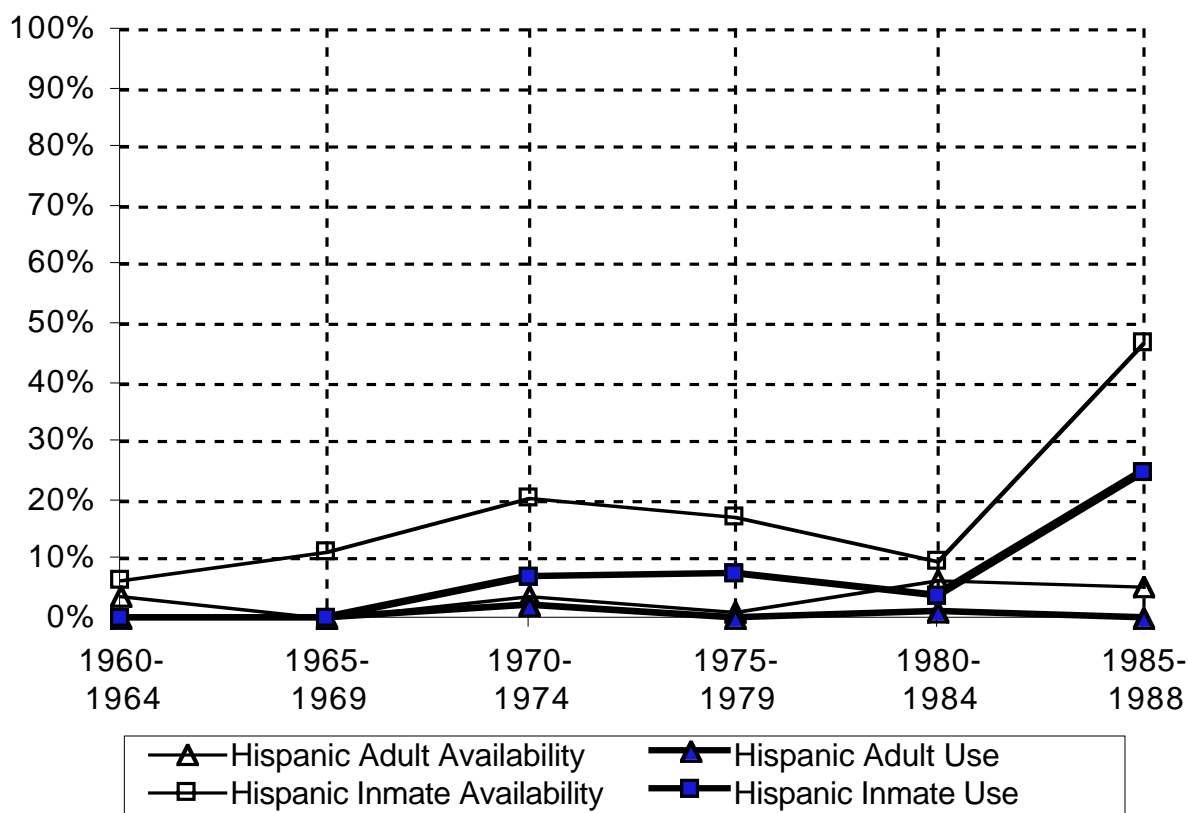


Fig 4.5B Texas Hispanic Adult and TDC Hispanic Inmate Availability and First Use of Heroin by Age 18, by Year of 18th Birthday



4.6 Summary and Conclusions

- * **Over the past twenty-five years, a wide variety of illicit drugs have become more available and more widely used by all individuals 18 or younger.** However, inmates entering the prison system are more likely to report availability and use of all drugs by age 18 than comparable age and gender-matched groups of Texas adult males.
- * **There are signs that the Texas population is growing more resistant to the use of powdered cocaine.** While availability of this drug continues to increase in the adult male population, a smaller percentage report first use by age 18.
- * **For most drugs, the gap between reported inmate and adult male drug use by age 18 increases through time.** One implication is that more prevention and education resources are needed to lessen substance use among youth at high risk for criminality and drug abuse.

- * **There are sharp racial/ethnic differences in reports of availability and use by age 18 among inmates on crack cocaine, amphetamines and heroin.** Availability and use of crack cocaine increased very rapidly in Black populations after 1984. The marked increase suggests that crack cocaine use is rapidly becoming a major problem in Texas. The increase in availability and use of amphetamines in the past decade has been particularly marked among Whites. There are some signs that heroin use is again increasing, particularly among young Hispanics.

V. INJECTION AND NEEDLE-SHARING

Sharing infected needles is linked to the spread of Human Immunodeficiency Virus (HIV) infection in the heterosexual population of the United States (Haverkos, 1988). The infection process consists of three necessary conditions: 1) An intravenous drug user (IVDU) 2) reuses paraphernalia 3) which contains infected blood. When all three conditions are met the probability of transmitting HIV infection is very high; thus, needle-sharing is a very efficient means of transmitting HIV infection. Once infected, the IVDU can pass infection to others through sexual contacts or sharing of needles.

While the general process is not mysterious, many basic questions about needle-sharing behavior remain. It is known that heroin injectors share needles; it is also known that cocaine use has become more popular and that some cocaine users inject. But it is not known whether cocaine injectors share needles, or whether amphetamine users do. Learning about drug-using behaviors such as these is critical for implementing effective AIDS prevention strategies.

5.1 Background

Since fewer than .5 percent of Texas adult males injected drugs within the past 30 days, it was not feasible to investigate thoroughly intravenous drug abuse with the general population survey. The prison setting, on the other hand, offered an opportunity to collect empirical information about IVDU and needle-sharing patterns because many people who shoot-up end up in prison. It is not certain that inmate IVDU and needle-sharing practices are the same as those of non-incarcerated IVDUs, so prison data is not used to make estimates on IVDU for the general population. However, the range of inmate IVDU behavior can reasonably be expected to reflect the range of such behavior among non-incarcerated IVDUs.

This section on needle usage is somewhat detailed because relatively little has been published on such behavior. In the sections which follow, the topic under consideration is risk; no questions in this survey ascertained any specific HIV infection rates. Recent information indicates that current rates of HIV infection among Texas prison incarcerated is, by national standards, low (Hammet, 1989). Also clear, however, is that there is a potential for the incidence of HIV infection to increase in the future in this at-risk population. In 1988, some 17 percent of inmates entering New York prisons tested HIV positive, a grim statistic that is matched by high rates of HIV infection among non-incarcerated IVDUs, and in births of HIV-infected infants.

Table 5.1A
Overview of Injection Among TDC Male Inmates

	All	Age			Race/Ethnicity		
		Younger	Middle	Older	White	Hispanic	Black
Sample Size	1027	361	418	235	368	228	424
Inmates Reporting IVDU							
At least once during lifetime	36.4%	29.4%	44.7%	33.2%	52.2%	32.5%	25.5%
Within 30 days of last incarceration	19.9%	17.7%	24.6%	14.9%	28.8%	19.7%	12.5%

5.2 Overview

Presented on Table 5.1A are summaries of reports of IVDU by inmates' age and race.

- * About 36 percent of inmates admit lifetime IVDU of at least one substance, 20 percent within their last month on the street.
- * Middle inmates are more likely than younger or older inmates to report lifetime and 30-day IVDU.
- * Whites are more likely than Blacks or Hispanics to report IVDU.
- * Significantly more inmates have injected cocaine than any other drug: 30 percent report lifetime cocaine injection, 13 percent within their last 30 days on the street.
- * Lifetime heroin or amphetamine injection is reported by 22 percent and 23 percent of the inmates, respectively.
- * Relatively few inmates admit injecting sedatives/tranquilizers or opiates other than heroin.

5.2 Major Drugs of Injection

5.2.1 Cocaine

Middle inmates are more likely than younger and older inmates to report lifetime injection of cocaine (Table 5.1B). Whites report lifetime injection of cocaine at higher rates than Blacks or Hispanics. However, there are no significant differences among racial/ethnic groups with respect to reporting of current injection of this drug. This suggests that cocaine injection could be of more recent origin among Blacks and Hispanics, or that a larger percentage of Whites are not regular injectors. Notice that about one-half of Black and Hispanic cocaine injectors report doing so in the past month, as compared to about one-third of White respondents.

5.2.2 Amphetamines

Middle inmates report higher incidence of lifetime amphetamine injection than do younger or older inmates. Injection of amphetamines in the last 30 days on the street is reported at much lower rates by older inmates. Inmates who currently inject amphetamines are almost all under 35 years of age, a reporting pattern which may reflect the relatively rapid physiological deterioration so often associated with this drug.

Injectors of amphetamines also tend, overwhelmingly, to be White. Notice that relatively few Black (10 percent) or Hispanic (11 percent) respondents have ever injected amphetamines while 18 percent of White inmates engaged in this behavior in their last month on the street.

Table 5.1B TDC Male Inmate Prevalence of IVDU, by Drug

Cocaine	All	Age			Race/Ethnicity		
		Younger	Middle	Older	White	Hispanic	Black
Injected at least once during lifetime	29.8%	24.9%	37.3%	24.7%	39.4%	26.8%	23.6%
Injected within 30 days of last incarceration	12.9%	10.8%	15.3%	11.5%	13.9%	14.9%	11.1%
Injected within year of last incarceration	6.5%	5.3%	8.4%	5.5%	9.0%	5.7%	5.0%
Injected more than one year before last incarceration	10.4%	8.9%	13.6%	7.7%	16.6%	6.1%	7.5%
Stimulants							
Injected at least once during lifetime	21.8%	19.4%	26.6%	17.4%	42.4%	9.6%	10.8%
Injected within 30 days of last incarceration	7.8%	9.4%	9.8%	2.1%	17.9%	3.5%	1.4%
Injected within year of last incarceration	3.9%	4.4%	4.1%	2.6%	7.9%	1.3%	1.9%
Injected more than one year before last incarceration	10.1%	5.5%	12.7%	12.8%	16.6%	4.8%	7.5%
Downers							
Injected at least once during lifetime	6.6%	4.2%	8.6%	7.2%	13.9%	1.8%	3.1%
Injected within 30 days of last incarceration	0.9%	1.4%	0.7%	0.4%	1.9%	0.4%	0.2%
Injected within year of last incarceration	0.8%	0.8%	1.0%	0.4%	1.4%	0.0%	0.7%
Injected more than one year before last incarceration	5.0%	1.9%	6.9%	6.4%	10.6%	1.3%	2.1%
Heroin							
Injected at least once during lifetime	22.5%	16.6%	25.4%	27.2%	31.0%	25.9%	13.7%
Injected within 30 days of last incarceration	6.5%	3.9%	9.1%	6.4%	7.6%	9.6%	4.0%
Injected within year of last incarceration	2.7%	1.9%	2.9%	3.8%	4.1%	3.5%	1.2%
Injected more than one year before last incarceration	13.2%	10.8%	13.4%	17.0%	19.3%	12.7%	8.5%
Opiates other than Heroin							
Injected at least once during lifetime	9.9%	7.2%	11.5%	11.9%	19.0%	6.1%	4.2%
Injected within 30 days of last incarceration	1.6%	0.8%	2.6%	0.9%	2.7%	1.3%	0.7%
Injected within year of last incarceration	1.2%	1.4%	1.2%	0.9%	1.9%	1.3%	0.5%
Injected more than one year before last incarceration	7.2%	5.0%	7.7%	10.2%	14.4%	3.5%	3.1%

5.2.3 Heroin

Lifetime and recent heroin injectors tend to be middle or older inmates. Heroin injection is also reported at lower rates by Blacks than Hispanics or Whites, but there are also some notable differences in reporting patterns between the latter two groups. Lifetime prevalence of heroin injection is reported at higher rates by Whites than Hispanics but injection within the past 30 days on the street is reported at higher rates by Hispanics than Whites. Although the second difference is not statistically significant, this general pattern of reporting could suggest that heroin injection may be a more recent and growing problem among Hispanic inmates as compared to White inmates whose use of this drug may be declining. Another interpretation of this pattern is that a larger proportion of White inmates are casual or occasional heroin injectors.

5.3 Injection of Multiple Substances

Inmate needle users tend to inject a variety of different drugs. The percentages of inmates reporting lifetime injection of one, two, and three or more substances is presented on Table 5.3A, and similar information on injection within the last 30 days on the street is reported on Table 5.3B.

Table 5.3A
TDC Male Inmates: Number of Drugs Injected in Lifetime

	N	Didn't Inject	Injected	1	2	3+
All	1027	63.6%	36.4%	9.5%	10.5%	16.4%
Younger Inmates	361	70.6%	29.4%	7.2%	8.3%	13.9%
Middle Inmates	418	55.3%	44.7%	12.4%	13.6%	18.7%
Older Inmates	235	66.8%	33.2%	8.1%	8.1%	17.0%
White Inmates	368	47.8%	52.2%	10.3%	13.0%	28.8%
Black Inmates	424	74.5%	25.5%	9.4%	7.1%	9.0%
Hispanic Inmates	228	67.5%	32.5%	8.8%	13.2%	10.5%

Overall, almost three-quarters of inmate IVDUs report injecting more than one substance in their lifetime. Some 40 percent of current IVDUs report injecting two or more substances in their last month on the street. Multi-substance injection patterns applies to all age and racial/ethnic groups of inmate IVDUs. Further analysis presented later in this report demonstrates that multiple drug IVDU may be associated with additional risk of HIV infection.

Table 5.3B
TDC Male Inmates: Number of Drugs Injected Within Last 30 Days on the Street

	N	Didn't Inject	Injected	1	2	3+
All	1027	80.1%	19.9%	11.9%	6.5%	1.5%
Younger Inmates	361	82.3%	17.7%	10.0%	6.6%	1.1%
Middle Inmates	418	75.4%	24.6%	14.8%	7.7%	2.2%
Older Inmates	235	85.1%	14.9%	9.4%	4.7%	0.9%
White Inmates	368	71.2%	28.8%	17.7%	7.6%	3.5%
Black Inmates	424	87.5%	12.5%	7.8%	4.5%	0.2%
Hispanic Inmates	228	80.3%	19.7%	10.5%	8.8%	0.4%

5.4 Needle-sharing

5.4.1 Overview

Presented on Table 5.4.1 is an overview of needle-sharing among inmates with age and racial/ethnic detail.

- * About 23 percent of inmates report sharing needles at least once in their lifetime, and 8 percent report sharing needles during their last month on the street.
- * 62 percent of lifetime injectors report needle-sharing at least once, and 39 percent of past month injectors report needle-sharing during that month.
- * Middle inmates are more likely than younger or older inmates to report needle-sharing within their lifetime, and within their last 30 days on the street.
- * Close to one-half of younger lifetime needle sharers, one-third of middle lifetime needle sharers, and less than one-quarter of older lifetime needle sharers report current needle-sharing.
- * Whites are more likely to report lifetime needle-sharing than Hispanic or Black inmates; however, Whites and Hispanics are equally likely to report needle-sharing within the past 30 days, with Blacks reporting this behavior at significantly lower rates.
- * A relatively large proportion of Hispanic lifetime needle sharers also report current needle-sharing. This may mean that needle-sharing is a recent phenomenon in this group, or that once needle-sharing is initiated by Hispanic IVDUs, they are not likely to abandon the behavior.

Table 5.4.1 TDC Male Inmates: Reports of Needle-Sharing

	All	Age			Race/Ethnicity		
		Young	Middle	Older	White	Hispanic	Black
At least once during lifetime	22.5%	14.0%	30.9%	21.4%	33.9%	21.1%	13.8%
Within 30 days of last incarceration	7.8%	5.8%	10.8%	4.3%	10.1%	11.4%	4.0%

5.4.2 *Drugs That Are Used When Needles are Shared*

Presented on Table 5.4.2 is general information about five different drugs and needle-sharing. The information presented is defined as follows:

- Col. 1: number of inmates reporting injection of each drug in their last month on the street.
- Col. 2: percent of these IVDUs who also report needle-sharing within the past month.
- Col. 3: number of injectors who report using a single substance in the past month.
- Col. 4: percent of single substance injectors that also report needle-sharing within the past month.

Table 5.4.2
TDC Male Inmates: Drugs That Are Used When Needles Are Shared

Drug Injected	N Current Injectors	% Reporting Needle- Sharing	N Single- Substance Injectors	% Reporting Needle-Sharing	Evidence of Needle-Sharing With This Substance?
Cocaine	94	56.4%	42	54.8%	Yes
Amphetamines	59	44.1%	29	48.3%	Yes
Sedatives	6	50.0%	2	50.0%	Yes
Heroin	51	54.9%	12	41.7%	Yes
Other Opiates	11	72.7%	0	N.A.	No

By comparing information on different substances, general profiles for drug-specific needle-sharing practices can be ascertained. Few inmates report injection of sedative/tranquilizers and opiates other than heroin as recently as the past month (Col. 1) and almost all injectors of these substances also reported use of some other substance within this time period. Therefore, sedatives/ tranquilizers and opiates other than heroin should be regarded as secondary drugs of injection; the few inmates who inject these substances almost always report recent injection of other substances as well. This leaves cocaine, amphetamines, and heroin as primary drugs of injection.

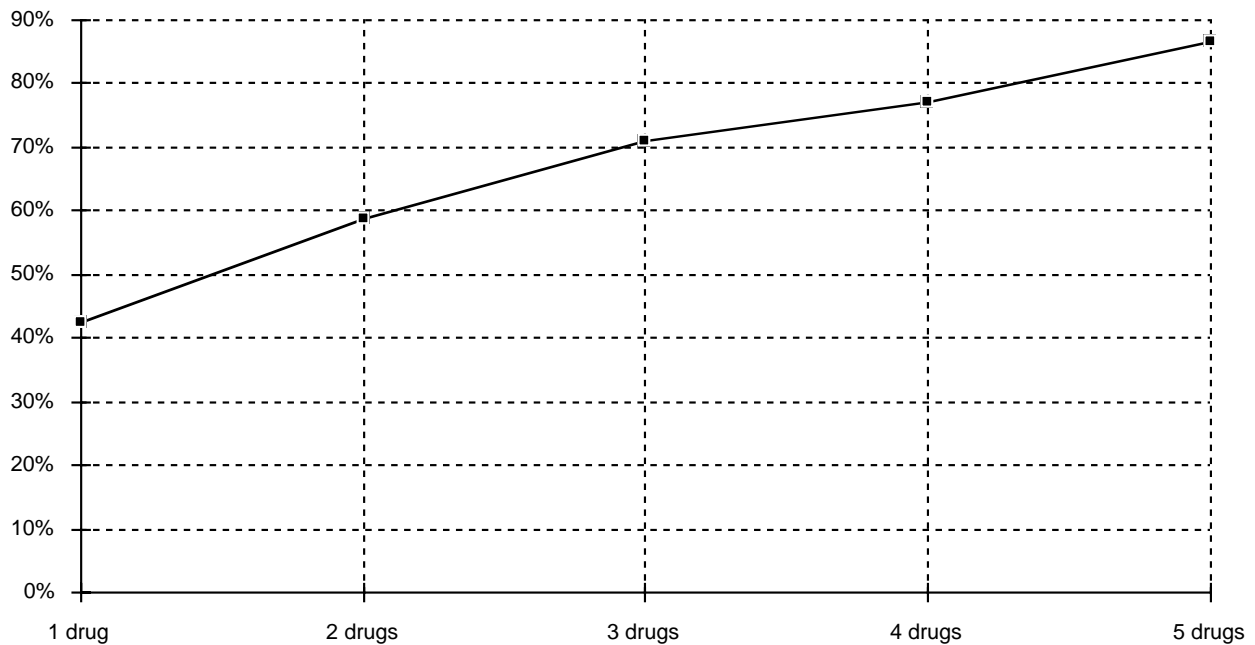
There is ample information indicating that heroin users indeed share needles (Feldman & Bier-nacki, 1988). This is reflected in the fact that 55 percent of past month heroin injectors admit sharing needles during their last month on the street. Relatively few recent heroin injectors (12 out of 55) injected only this substance in the past month, which suggests that most heroin injectors also inject other drugs.

While needle-sharing is known to be associated with heroin use, much less is known about needle-sharing and cocaine or amphetamines. About 56 percent of recent cocaine injectors also report recent needle-sharing. Of past month cocaine-only-IVDUs, about 55 percent report recent needle-sharing; about 48 percent of past month amphetamine-only IVDUs report recent needle-sharing. These reports confirm that needle-sharing is part of both cocaine and amphetamine injection behavior and that the popularity of these drugs should be considered when planning efforts to slow the spread of AIDS infection.

5.4.3 Number of Substances Injected and Needle-Sharing

Above it was shown that most inmate IVDUs have injected more than one substance in their lifetime. The probability of lifetime needle-sharing increases with the number of different substances ever injected (Fig 5.4.3). Just over 40 percent of inmates who have injected only one substance admit sharing needles while almost 90 percent of five-substance injectors also report needle-sharing.

Fig 5.4.3 Percent of TDC Male Inmates Reporting Needle-Sharing by Number of Drugs Injected



5.5 Knowledge and Attitudes about AIDS

Inmates who had ever injected were asked a series of four general questions about their awareness of AIDS and the extent to which they perceive themselves vulnerable to contracting it.

1. Have you heard publicity about the AIDS virus?

Some level of awareness about AIDS is virtually universal among inmate IVDUs. Of inmate lifetime injectors, 97 percent indicated that they had indeed received such information, 1 percent of respondents said they had not heard publicity about AIDS, and an additional 2 percent did not know or refused to answer the question.

2. Would you say AIDS is reaching epidemic proportions?

A large majority of inmate IVDUs believe that AIDS is a problem. About 87 percent of inmate lifetime IVDUs agreed that AIDS is reaching epidemic proportions, 6 percent disagreed with the statement, and 7 percent did not know or refused to answer.

3. Are you personally concerned about the possibility of contracting AIDS?

Presented on Table 5.5A are inmate IVDU responses to this question first for lifetime IVDUs, and then broken out by recency of injection and/or needle-sharing behavior. 61 percent of lifetime injectors were concerned about the possibility of contracting AIDS while 39 percent indicated that this possibility did not concern them.

Table 5.5A
Are you personally concerned about the possibility of contracting AIDS?

	Number	Yes	No	Don't Know
Lifetime Injectors	368	61.1%	38.6%	0.3%
Injectors not reporting needle-sharing	138	57.2%	42.8%	0.0%
Injectors reporting needle-sharing in lifetime	230	63.5%	36.1%	0.4%
Injectors reporting needle-sharing in past 30 days	80	67.5%	32.5%	0.0%

When these responses are broken out by recency of needle-sharing, two seemingly contradictory tendencies appear. First, concern appears to increase as a function of IVDUs risk for AIDS: 57 percent of non-needle-sharing injectors express concern compared to 68 percent of past month needle sharers. Thus, inmates appear to understand the risks involved in needle-sharing. Yet almost one-third of past month needle sharers do not express concern, a result which would suggest that risk of AIDS is not being taken seriously by a large proportion of those most at risk.

Table 5.5B
 What do you think your chances are of contracting AIDS?
 Are your chances high, medium, low, very low or none?

	Number	High	Medium	Low	Very Low	None	Don't Know
Lifetime Injectors	368	7.6%	13.6%	13.6%	28.3%	35.1%	1.9%
Injectors not reporting needle-sharing	138	5.1%	10.9%	15.2%	26.8%	40.6%	1.4%
Injectors reporting needle-sharing in lifetime	230	9.1%	15.2%	12.6%	29.1%	31.7%	2.2%
Injectors reporting needle-sharing in past 30 days	80	16.3%	20.0%	13.8%	21.3%	27.5%	1.3%

4. *What do you think your chances are of contracting AIDS: high, medium, low, very low or no chance at all?*

Presented on Table 5.5B are responses to the above question. The most frequently given response to this question is “no chance at all.” This generalization holds for the injector sample as a whole as well as all categories of needle sharers.

5.5 Summary

Many inmate IVDUs do not use heroin; the most prevalent drug of injection is cocaine.

About as many of these inmates use amphetamines as heroin, and needle-sharing occurs while using any of these three drugs.

No single drug-specific treatment or rehabilitation technique will be adequate to address the range of problems of IVDUs. The problems of IVDUs are hard to treat, especially among those addicted to heroin, amphetamines, or cocaine. Current treatment modalities have difficulties keeping these clients in treatment, dealing effectively with their multiple problem areas (addiction, employability, medical problems, and mental health problems) and preventing relapse once treatment is completed. An adequate treatment strategy for these individuals must include multiple intervention methods that match substance abusers with the type of program they need.

Injection behavior is a problem separate and distinct from the specific substances that are injected. A majority of IVDU inmates report lifetime injection of two or more substances, and 40 percent of past month IVDUs injected two or more substances within their last month on the street. Given this distribution, it seems likely that at least a few injectors are not too particular about what they shoot up as long as it comes in a needle. Also, these same injectors are not particular about the cleanliness of their needles: multiple substance injectors report higher rates of needle-sharing.

Many IVDUs end up in prison, a fact which could have HIV risk-reduction implications.

Over one-third of all inmate respondents reported that they had injected illicit substances in their lifetime, one-fifth in the past month. While in prison, these IVDUs are numerous and easy to locate. On the street, IVDUs are rare and hard to find. Thus, a major HIV risk-reduction campaign should be targeted to the prison setting.

There are a substantial number of inmates at risk who could potentially benefit from HIV

information. Although almost all inmate IVDUs have some knowledge of AIDS, and a very large majority even agree that AIDS is reaching epidemic proportions, many have not made the connection between injection, needle-sharing, risk of infection and their own mortality.

POLICE TIE SUSPECT TO NINE MORE HOLDUPS

A crack cocaine user suspected of robbing a string of convenience stores to support his habit was linked Thursday to nine more holdups than police first suspected. . . [The suspect was quoted as saying] . . . “crack is hell to get off of. . . I can’t even explain to you. . . I can’t tell you what it does to you. I had a job. . . . Look at me now. I haven’t bathed in four days.”

--*Austin American Statesman*, November 17, 1989

VI. SUBSTANCE USE AND CRIMINAL BEHAVIOR

Inmates heavily involved with the most addictive drugs tend to report more active criminal careers. Also, the responses of Texas inmates to a series of questions about drug use and adult career crime are consistent with the National Institute of Justice's assessment that "drug use accelerates criminal behavior" (Graham 1987,1-2). However, it would be an over-simplification to infer from this that "drugs cause crime." Some inmates who do not use drugs are deeply involved in criminal activities; there are many reasons for committing crimes, only a few of which pertain to substance abuse. In any case, higher self-reported criminality among heavy drug users is substantiated by the fact that these inmates are also more likely to be prison-recidivists than other inmates.

6.1 Methodology

Investigation of crime-drug issues is complicated by a number of problems, both methodological and substantive (McBride, 1976). This document is primarily intended for non-technical readers and discussion of these specialized issues must be limited. However, those familiar with crime-drug issues might wish to note some features of the methodology used in this analysis.

- 1) Analysis is restricted to a sample of inmates who are willing to discuss their criminal activities.
- 2) Standard categorical statistical techniques are used in analysis; parametric measures, which often have highly skewed distributions when used to summarize criminal activities, are not reported. The use of categorical statistical techniques also minimize potential problems of recall and estimation associated with events that may have occurred several years past.
- 3) Data acquired from self-report are, where possible, cross-validated against data acquired through official information sources.

6.2 The Crime-Drug Sample

In order to ascertain motives for committing the crimes for which they were sentenced to prison, inmates were asked, "*What would you say is the one main reason you committed the crime you were convicted of for this sentence?*"

181 inmates (18 percent) denied committing their instant offense (the offense for which they were sentenced), and another 6 inmates refused to answer. Both responses suggest a reluctance to discuss criminal behavior. Moreover, disavowal of the instant offense presents a logical problem for follow-up questions such as "Were drugs in any way involved?" Such questions presume guilt, and become literally meaningless when a respondent denies culpability. Therefore, responses of inmates who denied committing their instant offense were omitted from the investigation of crime-drug interrelationships. In addition, 13 inmates who were 17 years old when they

entered prison, and thus had not yet committed crimes while 18 or older, were omitted from the crime-drug section of analysis. The remaining “crime-drug sample” is used as a basis for summary reporting in the remainder of this section.

6.3 Inmates’ Crime Motives

The inmates’ motives for the instant offense are summarized on Table 6.3A. About one-quarter of crime-drug respondents volunteer economic motives, 12 percent to get “money for drugs” and 14 percent to get “money for other debts.” However, the largest category of response (47 percent) to this question is “other:” many inmates volunteered a wide variety of explanations which proved to be difficult to classify into categories of response.

Table 6.3A
TDC Male Inmates: Main Reason for Committing Crime

	Prison Sample		Crime-Drug Sample	
	N	%	N	%
Did not commit crime	181	17.6%		
Refused	6	0.6%		
Thought would 'get away' with crime	58	5.7%	58	7.0%
Didn't think would be punished	8	0.8%	8	1.0%
Anger/Jealousy	50	4.9%	48	5.8%
Doing what other people do	10	1.0%	10	1.2%
Perfect opportunity	17	1.7%	17	2.0%
Needed money for drugs	98	9.6%	96	11.6%
Needed money for debts	114	11.1%	113	13.6%
Kicks, thrill	34	3.3%	32	3.9%
Crime is easier than working	23	2.2%	23	2.8%
Influenced by peers	21	2.0%	20	2.4%
Other	386	37.6%	386	46.5%
Don't know	20	1.9%	20	2.4%

Table 6.3B

Were drugs in any way involved in the offense
for which you were sent to prison?

	N	%
Yes	347	41.76%
No	461	55.48%
Don't Know	13	1.56%
Refuse	10	1.20%

How were they [drugs] involved?

	N	%
NA - Question not asked	484	58.24%
Obvious involvement	220	26.47%
Factor in motivation of crime	98	11.79%
Factor in disinhibition of crime	26	3.13%
Don't know	3	0.36%

Inmates were asked two additional questions about their perceptions of the role of drugs in their instant offense:

- 1) *Were drugs in any way involved in the offense for which you are now in prison? [and, if so]*
- 2) *How were drugs involved?*

Some 42 percent of the crime-drug sample admit that drugs were a factor in their instant offense (Table 6.3B).

- * About 26 percent of the crime-drug sample said they had been arrested for possession or distribution of illicit drugs, or had such drugs in their possession when arrested for some other crime.
- * Some 12 percent identified drugs as a primary motivational factor in their crime. The crime was committed to directly obtain drugs, obtain money to buy drugs, or to protect their drug supply or drug business.
- * Few inmates (3 percent) reported taking drugs before the instant offense to reduce anxieties associated with committing the crime.

6.4 Illegal Income and Substance Involvement

One common view of the relationship between crime and drugs is that addicts have few alternatives except to break the law to get money to support their drug habits; the responses of inmates in the crime-drug sample are consistent with this explanation.

Inmates were asked, “*In the last year you were on the street, about how much money would you say you made per week from illegal activity?*” 51 percent reported no such income, 13 percent estimated “lower” illegal income (less than \$400 per week), and 37 percent estimated “higher” illegal incomes (\$400 per week or more).

If drug addiction produces an inelastic need for income to support drug habits, then one might expect that inmates who report addictions would also be more likely to report higher weekly illegal incomes. One might also expect that more expensive drug habits would be associated with higher illegal incomes: motivation to commit revenue-producing crime is based not on addiction alone, but also the expense of maintaining the addiction. In preparation for testing this hypothesis, inmates were classified into one of four groups based on self-reported substance use patterns and/or expenditures for illicit drugs as follows:

Type 1: Unclassified substance use pattern

These inmates may use drugs and/or alcohol but are not daily users of any substance and did not spend as much as \$200 for any illegal drug in the past month. Some 51 percent of inmates in the crime-drug sample have unclassified substance use patterns.

Type 2: Heavy alcohol use pattern

These inmates drink alcohol daily, and consume at least six drinks per occasion. Alternately, reporting alcohol consumption of more than 10 drinks on more than 10 days per month qualified respondents for this classification. Inmates in this category did not report daily use or expenditure of \$200 or more for any illicit drug. About 16 percent of the crime-drug sample has this pattern of heavy alcohol consumption.

Type 3: Heavy use of “less expensive” illicit drugs

Inmates included in this category are daily users of marijuana, downers, or hallucinogens, or spent \$200 in the past month for one of these drugs. Most inmates in this group are heavy marijuana users. These drugs are less expensive in the sense that daily users can and often do spend less than \$200 in a single month to maintain these habits. Some 9 percent of crime-drug sample inmates are categorized as Type 3.

Type 4: Heavy use of “more expensive” illicit drugs

Inmates who reported daily use of cocaine, amphetamines, heroin, or opiates other than heroin are included in this group. All of these drugs are known to have high potential for addiction (Erickson *et. al.*, 1989). Moreover, all of these drugs are “more expensive” in the sense that almost all daily users also must spend more than \$200 per month to maintain their drug habits. About 25 percent of the crime-drug sample have this pattern of substance use.

These groups are referred to as *patterns of heavy substance involvement*. When pattern of heavy substance involvement is cross-tabulated against illegal income, results statistically support the hypothesis that more expensive drug involvements tend to be associated with higher illegal incomes (Fig 6.4; $P=.000$, $\Phi=.401$; see Appendix D for all cross-tabulation tables and summary statistics). Type 1 and Type 2 inmates tend not to report illegal income, Type 3 inmates are more likely to report illegal incomes, and about 65 percent of Type 4 inmates report high (\$400 or more) weekly illegal incomes.

Fig 6.4 TDC Male Inmates: Reported Weekly Illegal Income by Type of Heavy Substance Involvement

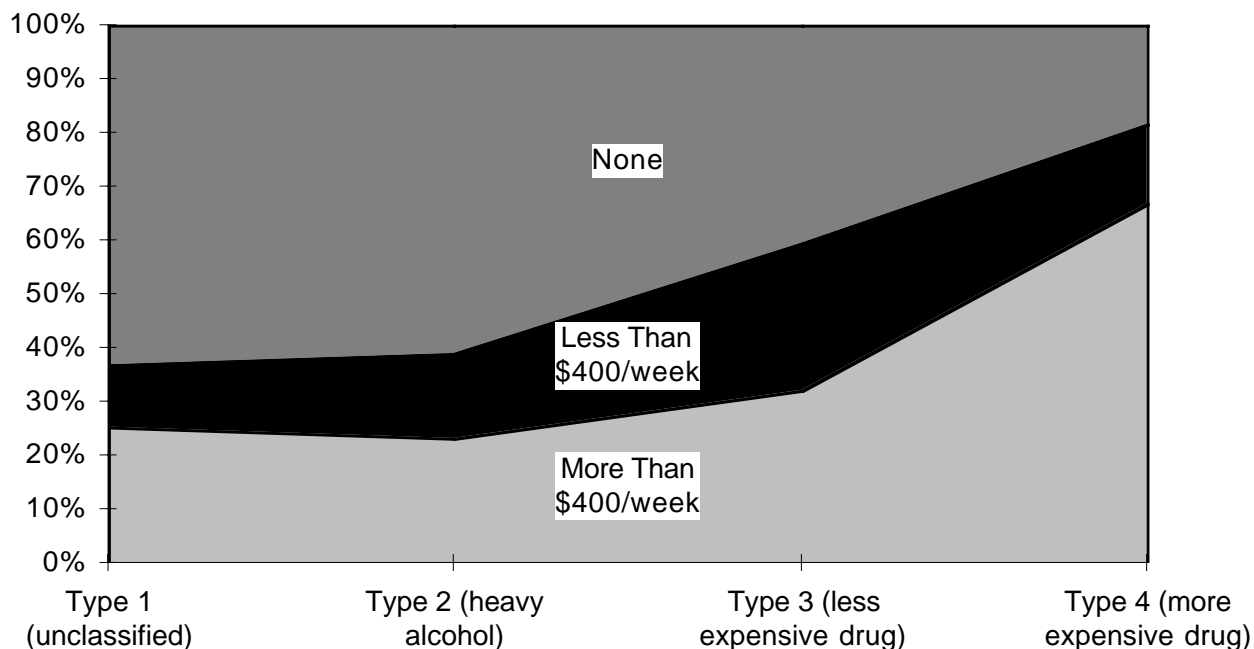
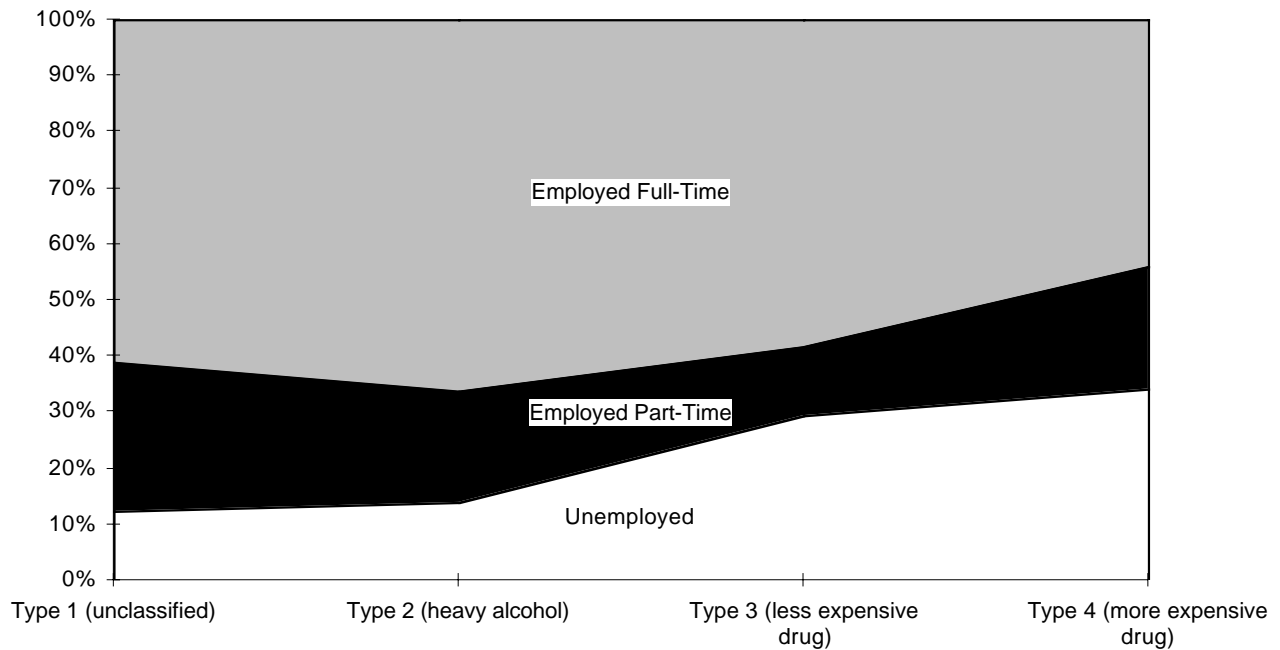


Fig 6.5 TDC Male Inmates: General Employment Status by Type of Heavy Substance Involvement



6.5 Employment and Substance Involvement

There are also significant associations between type of heavy substance involvement and employment status in the year prior to incarceration ($P=.010$, $\Phi=.141$). Shown in Figure 6.5 is the percentage of inmates reporting unemployment, part-time employment and full-time employment broken out by type of heavy substance involvement. Type 3 and Type 4 inmates are more than twice as likely to report past year unemployment than Type 1 or Type 2 inmates; in other words, inmates most in need of money to support their habits are the least likely to maintain adequate employment.

6.6 Self-Reported Crime and Substance Involvement

Type 1 inmates reported the least adult criminality, Type 2 inmates slightly more criminality, Type 3 even more and Type 4 the highest percentage of adult criminality. This pattern of self-report, where the intensity increases as the type of substance involvement becomes more expensive, is repeated over many measures of criminality.

6.6.1 Diversity of Adult Criminal Careers

In order to get information on patterns of adult criminal behavior, inmates were asked:

Regardless of how many times you were caught, how many times as an adult did you:

1. *Break into a car or building to steal something?*
2. *Steal something of value without breaking in anywhere?*
3. *Use a weapon to get something you wanted?*
4. *Physically hurt someone on purpose?*
5. *Damage or destroy property?*
6. *Commit some other type of offense which I haven't mentioned?*

The diversity of an adult criminal career is defined by the number of these different types of crime that inmates committed as adults. There are significant associations between type of heavy substance involvement and the diversity of adult criminal careers (see Figure 6.6.1A).

Fig 6.6.1A TDC Male Inmates: Diversity of Adult Criminal Careers by Type of Heavy Substance Involvement

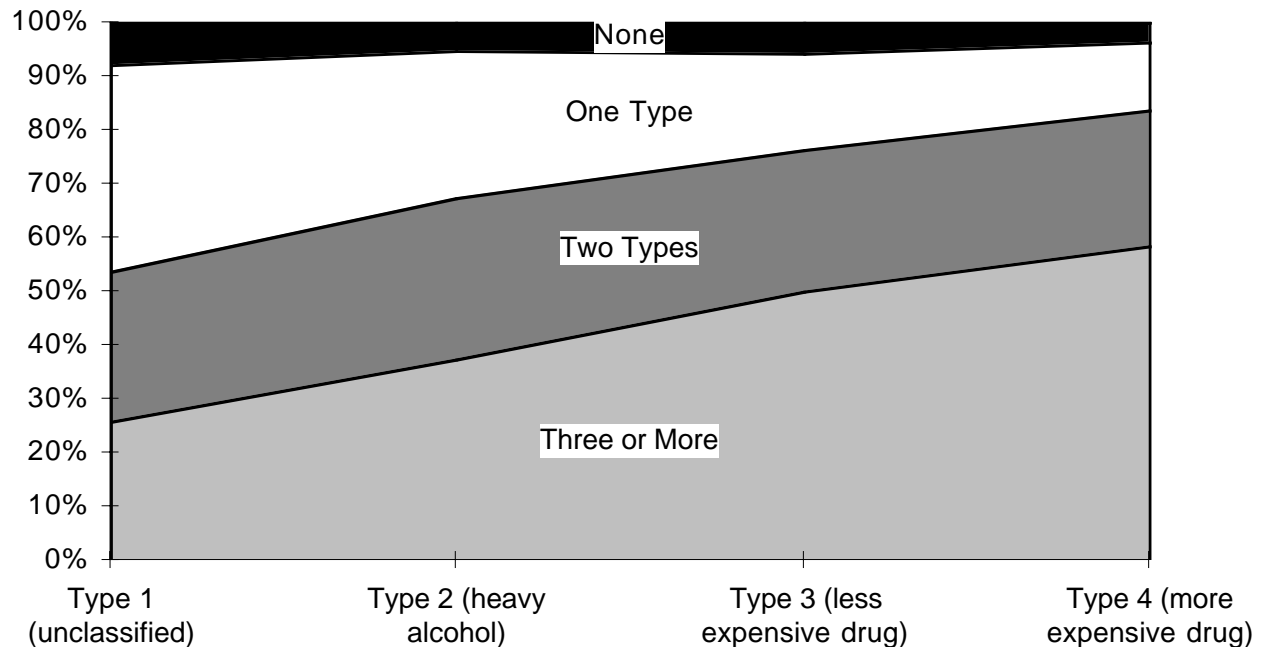
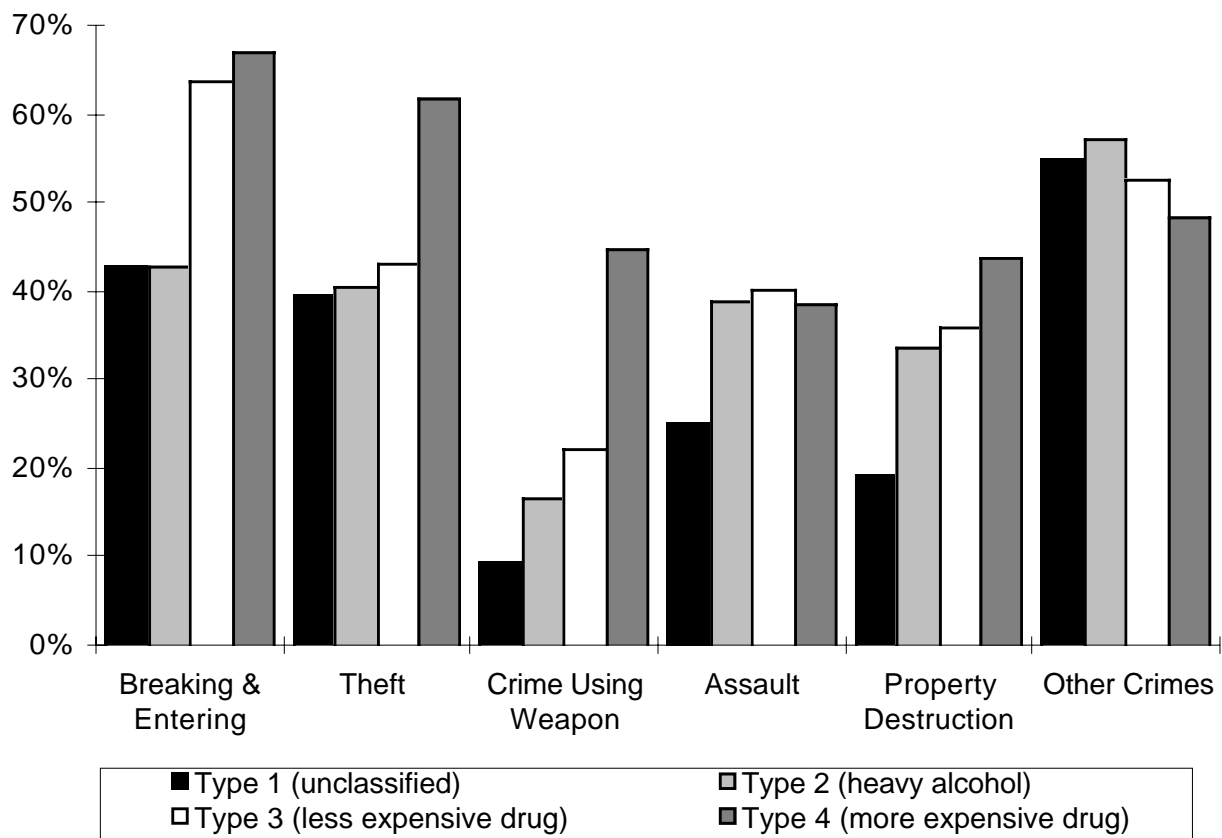


Fig 6.6.1B TDC Male Inmates: Percent Inmates Self-Reporting Six Types of Crime by Type of Heavy Substance Involvement



Over one-half (58 percent) of Type 4 inmates reported committing three or more different crimes. About one-half of Type 3 inmates reported three or more different kinds of crimes, whereas 37 percent of Type 2 inmates and 26 percent of Type 1 inmates reported committing as many as three different crimes. In other words, the more heavily involved an inmate is in substance use, the more diverse his self-reported criminal career tends to be.

Presented on Figure 6.6.1B is a summary of the percent of inmates who admit committing each of the six different crimes at least once, broken out by pattern of heavy substance involvement. Cross tabulations and statistical measures on each crime are presented in Appendix D. Differences are statistically significant on all but “miscellaneous crimes.” Type 4 inmates are associated with high rates of breaking and entering, theft, crimes using weapons, and property destruction. Differences are particularly sharp on crimes using weapons, with Type 4 inmates reporting this category of crime more than twice as often as the next highest group, those in Type 3.

6.6.2 *The Intensity of Adult Criminal Careers*

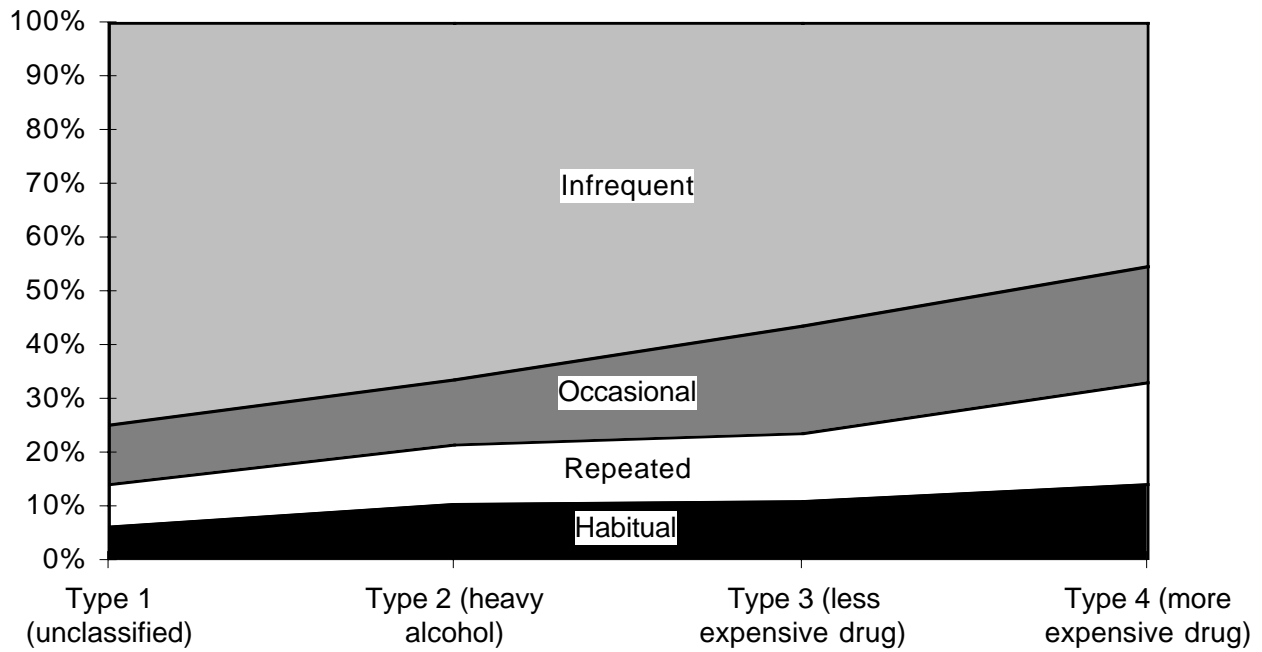
Intensity of criminal activities is defined as the number of times an inmate admits perpetrating each of the six different crimes. Four categories of intensity are defined as follows:

1. *Infrequent perpetrators* report committing a given type of crime from one to four times in their adult criminal careers.
2. *Occasional perpetrators* report committing a given crime between five and 19 times.
3. *Repeat perpetrators* report committing a given crime from 20 to one hundred times.
4. *Habitual perpetrators* admit committing a given crime more than one hundred times.

The intensity of self-reported crimes differs among perpetrators of the six crimes from one pattern of heavy substance involvement to another. For all six crime categories, the intensity of criminal careers tends to increase as substance abuse involvement gets more expensive (see Appendix D for cross-tabulations).

- * 422 inmates in the crime-drug sample admit **breaking and entering** at least once in their adult criminal careers, with Type 4 inmates showing the highest intensity level (Fig 6.6.2). Differences are statistically significant ($P=.000$, $\Phi=.267$).
- * 351 crime-drug sample inmates committed **theft**, and the intensity increases as substance use gets more expensive. Differences are statistically significant ($P=.000$, $\Phi=.375$).
- * 140 inmates committed **crimes while using a weapon**; of the 19 inmates who did so 20 or more times, 17 are Type 4. In other words almost all repeated or habitual perpetrators of crimes using a weapon are heavily involved with cocaine, amphetamines or heroin.
- * 268 inmates committed some form of **assault**. Only 22 inmates did so 20 or more times, so chi-square statistical tests of differences in reporting based on type of heavy substance involvement are unreliable. However, the intensity of assault careers appears to increase as substance use becomes more expensive.
- * 242 inmates engaged in **property destruction**. Relatively few (30) did so as many 20 times, rendering chi-square tests unreliable, but intensity appears to increase as the substance use becomes more expensive.
- * “Other crimes” are a residual category which includes a broad set of criminal activities from sale and distribution of drugs to indecent exposure. However, when asked the type of “other crime” committed, the most frequently mentioned response pertained to drugs. The self-reported intensity of “other crime” careers generally increases with more expensive substance involvement; results are statistically significant ($P=.000$, $\Phi=.408$).

Fig 6.6.2 TDC Male Inmates: Intensity of Criminal Careers
by Type of Heavy Substance Involvement:
Breaking and Entering



6.7 Recidivism and Substance Involvement

Based on TDC official records, 43 percent of inmates in the crime-drug sample have been incarcerated before; recidivism is common. Officially recorded recidivism also increases with the level of substance involvement (Table 6.7; $P=.000$, $\Phi=.166$). About 58 percent of Type 4 inmates have previously been in prison, compared to less than 40 percent of Type 1 or Type 2 inmates.

Table 6.7 Percent of the Crime-Drug Sample Recorded as Recidivists

Level of Substance Involvement	Percent Recidivists
Type 1 (unclassified)	39%
Type 2 (heavy alcohol)	38%
Type 3 (less expensive drug)	44%
Type 4 (more expensive drug)	58%

6.8 Summary

It is clear that drug use accelerates crime. Self-reports of higher illegal incomes and more diverse and intense criminal careers are corroborated by official records of recidivism: inmates reporting more crimes are more likely to be prison-recidivists. More intense substance abuse is associated with higher illegal incomes, as well as more diverse and intense criminal careers.

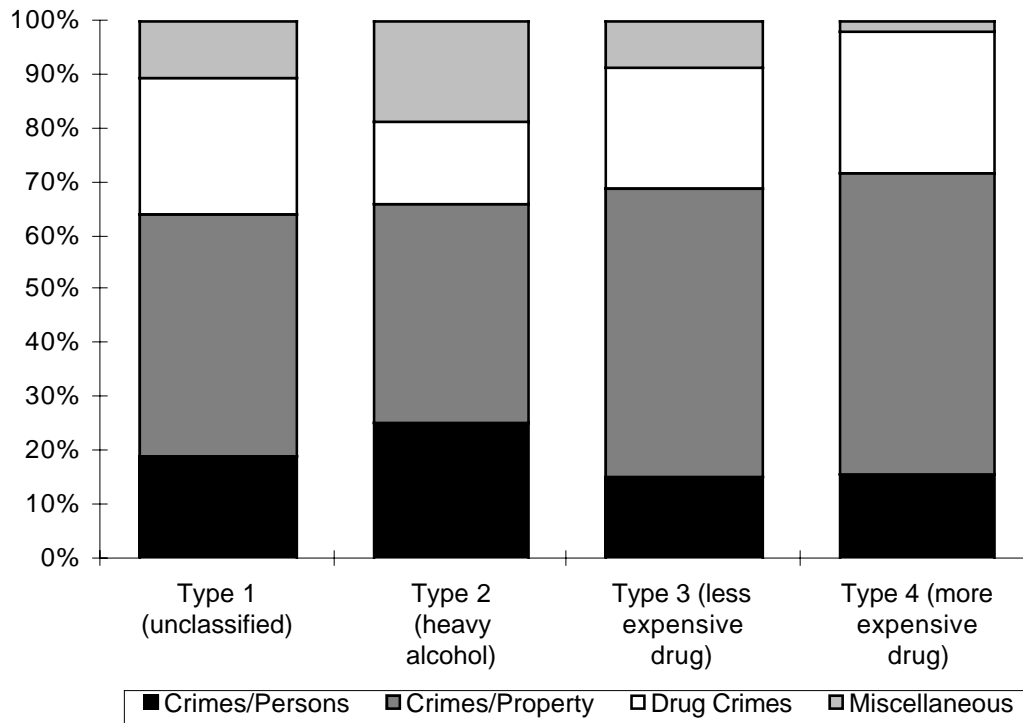
The association between crime and heavy substance involvement may be due to a double-edged economic sword: increasing substance-related unemployment on one edge, coupled with an increasing need for drug money on the other. Although this observation does not explain criminality (many inmates commit crime for reasons which may not be connected with their substance use), it does account for some of the different rates of illegal income, unemployment, and crime among inmates entering the Texas prison system.

An interesting feature of self-reported crime is that Type 4 inmates do not restrict themselves to property crimes such as breaking and entering and theft. They also report more violent crimes such as using weapons and assault. Thus, it is not accurate to categorize this group as “less violent,” as is commonly perceived. Based on self-report, those who are heavily involved with cocaine, amphetamines or heroin are also more prone to be violent than are other offenders.

Official reports of offense of record can be somewhat misleading in terms of classifying inmates as violent or non-violent. Shown in Figure 6.8 are four categories of offense of record, broken out by pattern of heavy substance involvement. The four categories of offense of record are defined as follows:

1. *Crimes against persons* -- crimes which involve violence or threat of violence against human beings. Assault, robbery, kidnapping and rape are examples.
2. *Crimes against property* -- crimes which involve illegal appropriation of property without explicit threat of physical violence. Burglary, theft, forgery, fraud and counterfeiting are examples of crimes against property.
3. *Drug crimes* -- crimes which are violations of statutory prohibitions on possession, distribution, or manufacture of controlled substances.
4. *Miscellaneous crimes* -- any crime not fitting into any of the above categories is defined as miscellaneous crime. Bribery, public order violations, polygamy, incest, and indecent exposure are examples.

Fig 6.8 TDC Male Inmates: Crime of Record by Type of Heavy Substance Involvement



This taxonomy of crime corresponds to that suggested by McBride (1976). The reader should refer to Table 2.3.2 for a complete enumeration of the specific crimes included under each of these categories. The supporting cross-tabulation table and summary statistics are located in Appendix D.

According to official reports of offenses of record, the inmates most likely to be incarcerated for crimes against persons are Type 2; 25 percent of this group were incarcerated for such offenses. A smaller proportion (16 percent) of Type 4 inmates were incarcerated for crimes against persons. Thus, from the perspective of the official offense of record, it appears that heavy alcohol users are slightly more likely to be violent than heavy users of cocaine, amphetamines or heroin. However, appearances can be deceptive.

Few criminals are arrested and convicted for every crime they commit. According to the 1987 National Crime Survey, only about 37 percent of victimizations were reported to police; of crimes reported to police, only about 47 percent of violent crimes and 18 percent of property

crimes resulted in arrest (Jamieson and Flanagan 1989, Tables 3.4 and 4.18). A much smaller percentage resulted in conviction and prison incarceration. With these facts in mind, consider the example of two hypothetical felons, both of whom might have appeared in the crime-drug sample.

The first is a heavy alcohol user who has committed murder. He has no other recent criminal involvement. The second is a heavy cocaine user who has committed a string of armed robberies (10), assaults (4), burglaries (50) and thefts (50). Obviously, the first hypothetical felon is very likely to stand convicted of violent crime and this will be reflected in his crime of record. Based on the second felon's criminal activities, he might stand convicted of a violent crime, a property crime, or some combination of the two. In any case, the second felon is less likely than the first to be classified as violent on the basis of offense of record even though he has actually committed 13 more violent crimes. Thus, although crimes of record are accurate for classifying as violent or non-violent those offenders who commit only a narrow range of crimes, they are less effective for classifying offenders who commit a broad range of crimes, such as many Type 4 inmates.

The relationships outlined above between heavy use of drugs and criminality underscore the urgency of recent remarks by the Texas Criminal Justice Policy Council. "The far greater use of drugs among offenders in prison than in the general population makes the identification of intervention strategies to deal with drug offenders and their drug dependent criminal behavior essential" (Fabelo and Riechers, 1989, p. i).

- * High illegal incomes among heavy drug users point to a relationship between drug use and crime-related economic costs to the community.
- * High rates of unemployment among heavy drug users suggest that drug use not only creates a need for drug money, but also reduces an individual's ability to make money legally.
- * The more diverse and intense criminal careers of heavy drug users suggest that such heavy drug use contributes to the total volume of crime in the community (According to the U.S. Census Bureau, in 1988 one out of four American families was victimized by crime).
- * The relatively high levels of violent crime among heavy users of amphetamines, cocaine, and heroin suggest a connection between use of these drugs and violence in the community.
- * The connection between heavy drug use and recidivism suggest that drug use must be taken into account as a major factor associated with current overcrowding in the Texas prison system.

There is a large and growing body of scientific literature and program experience which suggests that many drug-addicted offenders can be treated and rehabilitated to live drug-free, crime-free and economically productive lives (Chaiken, 1989; Luekefeld 1988; Luekefeld and Timms 1988; Wexler *et. al.*, 1988). This chemical dependency treatment and rehabilitation task is not quick, easy, convenient, inexpensive or effective for all cases. Moreover, it comes at a time when budgets are strained and state and local incarceration facilities are filled to capacity. Yet the evidence suggests that without such programs, drug-addicted offenders will continue in their addictions and in their criminal life styles, and will remain as the predominant reason why crime rates remain high and prisons overcrowded.

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APPENDIX A

PREVALENCE AND REGENCY OF USE BY AGE GROUP:
ADULT PRISON INMATES 1988

	EVER USED	PAST MONTH	PAST YEAR	NOT PAST YEAR	NEVER USED
TOBACCO	92.8%	81.3%	3.7%	7.8%	7.2%
ADULTS 18-25	91.1%	80.3%	5.3%	5.5%	8.9%
ADULTS 26-34	92.6%	82.1%	2.9%	7.7%	7.4%
ADULTS 35 & OLDER	96.2%	82.1%	2.6%	11.5%	3.8%
ALCOHOL	97.6%	64.9%	23.6%	9.1%	2.4%
ADULTS 18-25	97.2%	65.4%	26.0%	5.8%	2.8%
ADULTS 26-34	97.8%	67.0%	21.8%	9.1%	2.2%
ADULTS 35 & OLDER	97.9%	62.1%	21.7%	14.0%	2.1%
MARIJUANA	84.2%	32.3%	18.6%	33.3%	15.8%
ADULTS 18-25	88.6%	43.1%	20.8%	24.7%	11.4%
ADULTS 26-34	88.2%	29.9%	20.2%	38.1%	11.8%
ADULTS 35 & OLDER	71.1%	18.7%	13.2%	39.1%	28.9%
INHALANTS	27.2%	2.1%	2.1%	22.9%	72.8%
ADULTS 18-25	29.7%	3.6%	3.6%	22.5%	70.3%
ADULTS 26-34	29.4%	1.7%	1.9%	25.8%	70.6%
ADULTS 35 & OLDER	18.7%	**	**	18.3%	81.3%
COCAINE (POWDER)	57.5%	21.6%	18.1%	17.8%	42.5%
ADULTS 18-25	56.7%	23.6%	18.9%	14.2%	43.3%
ADULTS 26-34	65.4%	22.4%	20.2%	22.8%	34.6%
ADULTS 35 & OLDER	44.9%	16.7%	13.2%	15.0%	55.1%
CRACK	23.7%	9.6%	8.4%	5.8%	76.3%
ADULTS 18-25	27.0%	12.3%	8.4%	6.4%	73.0%
ADULTS 26-34	26.1%	9.8%	9.6%	6.7%	73.9%
ADULTS 35 & OLDER	15.0%	5.1%	6.4%	3.4%	85.0%
UPPERS	50.5%	10.3%	11.9%	28.4%	49.5%
ADULTS 18-25	51.8%	12.6%	15.7%	23.5%	48.2%
ADULTS 26-34	53.7%	12.2%	11.0%	30.5%	46.3%
ADULTS 35 & OLDER	43.6%	3.4%	8.1%	32.1%	56.4%
DOWNERS	43.8%	5.6%	10.8%	27.5%	56.2%
ADULTS 18-25	39.4%	8.9%	11.5%	19.0%	60.6%
ADULTS 26-34	50.4%	4.8%	12.0%	33.5%	49.6%
ADULTS 35 & OLDER	39.7%	1.3%	7.7%	30.8%	60.3%
HEROIN	25.7%	7.8%	5.7%	12.2%	74.3%
ADULTS 18-25	21.7%	5.3%	7.5%	8.9%	78.3%
ADULTS 26-34	27.6%	10.1%	4.3%	13.2%	72.4%
ADULTS 35 & OLDER	28.9%	8.1%	4.7%	16.2%	71.1%
OTHER OPIATES	25.6%	3.7%	5.0%	17.0%	74.4%
ADULTS 18-25	22.2%	3.6%	6.4%	12.2%	77.8%
ADULTS 26-34	29.4%	4.5%	3.8%	21.1%	70.6%
ADULTS 35 & OLDER	25.2%	2.6%	4.7%	17.9%	74.8%
PSYCHEDELICS	44.1%	4.8%	8.3%	31.0%	55.9%
ADULTS 18-25	44.8%	9.7%	14.2%	20.9%	55.2%
ADULTS 26-34	48.6%	2.4%	5.8%	40.4%	51.4%
ADULTS 35 & OLDER	34.8%	0.9%	3.0%	30.9%	65.2%
ILLICIT DRUG(S)	86.9%	47.2%	16.8%	22.8%	13.1%
ADULTS 18-25	91.4%	55.7%	18.8%	16.9%	8.6%
ADULTS 26-34	90.0%	47.6%	18.2%	24.2%	10.0%
ADULTS 35 & OLDER	75.3%	33.2%	11.9%	30.2%	24.7%
COCAINE (BOTH FORMS)	60.4%	25.2%	19.1%	16.1%	39.6%
ADULTS 18-25	60.7%	28.5%	19.7%	12.5%	39.3%
ADULTS 26-34	67.9%	26.3%	21.3%	20.3%	32.1%
ADULTS 35 & OLDER	46.8%	17.9%	14.5%	14.5%	53.2%

The maximum 95% confidence limit for the sample of 1047 inmates is $\pm 3\%$.
On any age group, the maximum 95% confidence limit is $\pm 6\%$.

**PREVALENCE AND REGENCY OF USE BY AGE GROUP:
BLACK PRISON INMATES 1988**

	EVER USED	PAST MONTH	PAST YEAR	NOT PAST YEAR	NEVER USED
TOBACCO	90.8%	79.7%	3.5%	7.5%	9.2%
ADULTS 18-25	88.0%	76.8%	4.2%	7.0%	12.0%
ADULTS 26-34	91.1%	83.3%	2.1%	5.7%	8.9%
ADULTS 35 & OLDER	96.5%	78.8%	4.7%	12.9%	3.5%
ALCOHOL	96.0%	62.7%	23.6%	9.7%	4.0%
ADULTS 18-25	95.8%	54.2%	33.1%	8.5%	4.2%
ADULTS 26-34	96.4%	69.8%	17.7%	8.9%	3.6%
ADULTS 35 & OLDER	96.5%	63.5%	20.0%	12.9%	3.5%
MARIJUANA	81.8%	23.9%	22.0%	35.9%	18.2%
ADULTS 18-25	82.3%	30.5%	24.1%	27.7%	17.7%
ADULTS 26-34	88.0%	22.4%	24.0%	41.7%	12.0%
ADULTS 35 & OLDER	69.4%	15.3%	15.3%	38.8%	30.6%
INHALANTS	17.5%	0.5%	0.5%	16.5%	82.5%
ADULTS 18-25	15.5%	0.7%	0.7%	14.1%	84.5%
ADULTS 26-34	19.8%	0.5%	0.5%	18.8%	80.2%
ADULTS 35 & OLDER	16.5%	**	**	16.5%	83.5%
COCAINE (POWDER)	54.3%	21.8%	17.1%	15.4%	45.7%
ADULTS 18-25	45.4%	18.4%	17.0%	9.9%	54.6%
ADULTS 26-34	62.0%	22.9%	18.8%	20.3%	38.0%
ADULTS 35 & OLDER	53.6%	26.2%	13.1%	14.3%	46.4%
CRACK	35.3%	16.1%	13.0%	6.2%	64.7%
ADULTS 18-25	37.1%	18.6%	12.1%	6.4%	62.9%
ADULTS 26-34	38.0%	16.7%	14.1%	7.3%	62.0%
ADULTS 35 & OLDER	28.2%	11.8%	12.9%	3.5%	71.8%
UPPERS	36.8%	2.1%	6.9%	27.8%	63.2%
ADULTS 18-25	30.7%	0.7%	10.7%	19.3%	69.3%
ADULTS 26-34	42.2%	2.6%	5.7%	33.9%	57.8%
ADULTS 35 & OLDER	36.9%	3.6%	3.6%	29.8%	63.1%
DOWNERS	35.7%	2.1%	6.1%	27.4%	64.3%
ADULTS 18-25	21.1%	2.8%	3.5%	14.8%	78.9%
ADULTS 26-34	44.5%	2.1%	7.3%	35.1%	55.5%
ADULTS 35 & OLDER	42.4%	1.2%	8.2%	32.9%	57.6%
HEROIN	17.5%	5.7%	2.6%	9.2%	82.5%
ADULTS 18-25	12.0%	1.4%	5.6%	4.9%	88.0%
ADULTS 26-34	17.2%	7.8%	0.5%	8.9%	82.8%
ADULTS 35 & OLDER	28.2%	8.2%	2.4%	17.6%	71.8%
OTHER OPIATES	17.7%	1.7%	3.1%	13.0%	82.3%
ADULTS 18-25	5.6%	0.7%	2.8%	2.1%	94.4%
ADULTS 26-34	22.9%	1.6%	3.1%	18.2%	77.1%
ADULTS 35 & OLDER	27.1%	3.5%	3.5%	20.0%	72.9%
PSYCHEDELICS	29.3%	0.5%	4.0%	24.8%	70.7%
ADULTS 18-25	22.7%	1.4%	5.7%	15.6%	77.3%
ADULTS 26-34	36.5%	**	3.6%	32.8%	63.5%
ADULTS 35 & OLDER	25.9%	**	2.4%	23.5%	74.1%
ILLICIT DRUG(S)	84.7%	42.2%	18.9%	23.6%	15.3%
ADULTS 18-25	85.9%	45.1%	21.1%	19.7%	14.1%
ADULTS 26-34	90.1%	40.6%	21.4%	28.1%	9.9%
ADULTS 35 & OLDER	72.9%	41.2%	10.6%	21.2%	27.1%
COCAINE (BOTH FORMS)	60.4%	29.0%	19.1%	12.3%	39.6%
ADULTS 18-25	54.9%	28.2%	19.0%	7.7%	45.1%
ADULTS 26-34	66.1%	30.2%	20.3%	15.6%	33.9%
ADULTS 35 & OLDER	58.8%	29.4%	16.5%	12.9%	41.2%

The maximum 95% confidence limit for Black inmates on any drug is $\pm 5\%$.

**PREVALENCE AND REGENCY OF USE BY AGE GROUP:
HISPANIC PRISON INMATES 1988**

	EVER USED	PAST MONTH	PAST YEAR	NOT PAST YEAR	NEVER USED
TOBACCO	93.4%	78.9%	5.3%	9.2%	6.6%
ADULTS 18-25	91.7%	77.4%	7.1%	7.1%	8.3%
ADULTS 26-34	93.2%	76.1%	5.7%	11.4%	6.8%
ADULTS 35 & OLDER	96.0%	86.0%	2.0%	8.0%	4.0%
ALCOHOL	98.2%	71.9%	16.7%	9.6%	1.8%
ADULTS 18-25	98.8%	76.2%	17.9%	4.8%	1.2%
ADULTS 26-34	97.7%	75.0%	10.2%	12.5%	2.3%
ADULTS 35 & OLDER	98.0%	62.0%	22.0%	14.0%	2.0%
MARIJUANA	80.5%	35.8%	14.2%	30.5%	19.5%
ADULTS 18-25	92.9%	53.6%	15.5%	23.8%	7.1%
ADULTS 26-34	81.4%	30.2%	16.3%	34.9%	18.6%
ADULTS 35 & OLDER	58.0%	14.0%	10.0%	34.0%	42.0%
INHALANTS	35.5%	2.6%	3.9%	28.9%	64.5%
ADULTS 18-25	39.3%	4.8%	7.1%	27.4%	60.7%
ADULTS 26-34	42.0%	2.3%	2.3%	37.5%	58.0%
ADULTS 35 & OLDER	16.0%	**	**	16.0%	84.0%
COCAINE (POWDER)	54.6%	23.8%	15.4%	15.4%	45.4%
ADULTS 18-25	60.7%	26.2%	19.0%	15.5%	39.3%
ADULTS 26-34	58.6%	27.6%	13.8%	17.2%	41.4%
ADULTS 35 & OLDER	36.0%	10.0%	14.0%	12.0%	64.0%
CRACK	11.8%	3.9%	3.5%	4.4%	88.2%
ADULTS 18-25	15.5%	7.1%	3.6%	4.8%	84.5%
ADULTS 26-34	12.5%	2.3%	5.7%	4.5%	87.5%
ADULTS 35 & OLDER	4.0%	**	**	4.0%	96.0%
UPPERS	43.4%	4.9%	9.3%	29.2%	56.6%
ADULTS 18-25	52.4%	9.8%	8.5%	34.1%	47.6%
ADULTS 26-34	45.5%	3.4%	12.5%	29.5%	54.5%
ADULTS 35 & OLDER	22.0%	**	6.0%	16.0%	78.0%
DOWNERS	36.4%	6.7%	11.1%	18.7%	63.6%
ADULTS 18-25	39.5%	14.8%	11.1%	13.6%	60.5%
ADULTS 26-34	40.9%	2.3%	13.6%	25.0%	59.1%
ADULTS 35 & OLDER	24.0%	**	6.0%	18.0%	76.0%
HEROIN	28.5%	11.0%	8.3%	9.2%	71.5%
ADULTS 18-25	28.6%	10.7%	9.5%	8.3%	71.4%
ADULTS 26-34	31.8%	12.5%	6.8%	12.5%	68.2%
ADULTS 35 & OLDER	24.0%	10.0%	8.0%	6.0%	76.0%
OTHER OPIATES	17.1%	2.6%	4.4%	10.1%	82.9%
ADULTS 18-25	20.2%	3.6%	4.8%	11.9%	79.8%
ADULTS 26-34	17.0%	3.4%	3.4%	10.2%	83.0%
ADULTS 35 & OLDER	12.0%	**	4.0%	8.0%	88.0%
PSYCHEDELICS	41.0%	4.0%	6.6%	30.4%	59.0%
ADULTS 18-25	46.4%	8.3%	11.9%	26.2%	53.6%
ADULTS 26-34	42.5%	2.3%	1.1%	39.1%	57.5%
ADULTS 35 & OLDER	26.0%	**	2.0%	24.0%	74.0%
ILLICIT DRUG(S)	82.5%	48.2%	13.6%	20.6%	17.5%
ADULTS 18-25	94.0%	63.1%	15.5%	15.5%	6.0%
ADULTS 26-34	81.8%	48.9%	12.5%	20.5%	18.2%
ADULTS 35 & OLDER	64.0%	22.0%	12.0%	30.0%	36.0%
COCAINE (BOTH FORMS)	55.3%	24.6%	16.2%	14.5%	44.7%
ADULTS 18-25	61.9%	28.6%	19.0%	14.3%	38.1%
ADULTS 26-34	59.1%	27.3%	15.9%	15.9%	40.9%
ADULTS 35 & OLDER	36.0%	10.0%	14.0%	12.0%	64.0%

The maximum 95% confidence limit for Hispanic inmates on any drug is $\pm 6\%$.

**PREVALENCE AND REGENCY OF USE BY AGE GROUP:
WHITE PRISON INMATES 1988**

	EVER USED	PAST MONTH	PAST YEAR	NOT PAST YEAR	NEVER USED
TOBACCO	94.8%	85.1%	2.4%	7.3%	5.2%
ADULTS 18-25	93.9%	87.0%	3.8%	3.1%	6.1%
ADULTS 26-34	94.8%	84.4%	2.2%	8.1%	5.2%
ADULTS 35 & OLDER	96.0%	83.0%	1.0%	12.0%	4.0%
ALCOHOL	99.2%	63.9%	27.4%	7.9%	0.8%
ADULTS 18-25	98.5%	71.8%	23.7%	3.1%	1.5%
ADULTS 26-34	100.0%	58.5%	34.1%	7.4%	0.0%
ADULTS 35 & OLDER	99.0%	61.0%	23.0%	15.0%	1.0%
MARIJUANA	89.4%	40.1%	16.9%	32.4%	10.6%
ADULTS 18-25	93.1%	51.1%	19.8%	22.1%	6.9%
ADULTS 26-34	93.3%	40.3%	17.2%	35.8%	6.7%
ADULTS 35 & OLDER	79.0%	24.0%	13.0%	42.0%	21.0%
INHALANTS	33.8%	3.8%	3.0%	27.0%	66.2%
ADULTS 18-25	40.0%	6.2%	4.6%	29.2%	60.0%
ADULTS 26-34	35.6%	3.0%	3.7%	28.9%	64.4%
ADULTS 35 & OLDER	22.0%	1.0%	**	21.0%	78.0%
COCAINE (POWDER)	63.5%	20.4%	21.0%	22.1%	36.5%
ADULTS 18-25	67.2%	28.2%	21.4%	17.6%	32.8%
ADULTS 26-34	75.4%	18.7%	26.1%	30.6%	24.6%
ADULTS 35 & OLDER	42.0%	12.0%	13.0%	17.0%	58.0%
CRACK	18.0%	5.4%	6.3%	6.3%	82.0%
ADULTS 18-25	24.4%	9.2%	7.6%	7.6%	75.6%
ADULTS 26-34	17.8%	4.4%	5.9%	7.4%	82.2%
ADULTS 35 & OLDER	9.1%	2.0%	4.0%	3.0%	90.9%
UPPERS	71.1%	23.2%	19.3%	28.6%	28.9%
ADULTS 18-25	74.8%	27.5%	26.0%	21.4%	25.2%
ADULTS 26-34	76.1%	32.1%	17.9%	26.1%	23.9%
ADULTS 35 & OLDER	60.0%	5.0%	13.0%	42.0%	40.0%
DOWNERS	58.4%	9.0%	16.2%	33.2%	41.6%
ADULTS 18-25	59.5%	12.2%	20.6%	26.7%	40.5%
ADULTS 26-34	66.2%	10.5%	18.0%	37.6%	33.8%
ADULTS 35 & OLDER	45.5%	2.0%	8.1%	35.4%	54.5%
HEROIN	33.9%	8.5%	7.7%	17.8%	66.1%
ADULTS 18-25	28.5%	6.2%	8.5%	13.8%	71.5%
ADULTS 26-34	40.3%	11.9%	8.2%	20.1%	59.7%
ADULTS 35 & OLDER	32.0%	7.0%	5.0%	20.0%	68.0%
OTHER OPIATES	40.6%	6.8%	7.6%	26.2%	59.4%
ADULTS 18-25	42.0%	6.9%	11.5%	23.7%	58.0%
ADULTS 26-34	47.4%	9.6%	5.2%	32.6%	52.6%
ADULTS 35 & OLDER	30.3%	3.0%	6.1%	21.2%	69.7%
PSYCHEDELICS	63.5%	10.4%	14.3%	38.7%	36.5%
ADULTS 18-25	68.5%	20.0%	24.6%	23.8%	31.5%
ADULTS 26-34	70.1%	6.0%	11.9%	52.2%	29.9%
ADULTS 35 & OLDER	46.9%	2.0%	4.1%	40.8%	53.1%
ILLICIT DRUG(S)	92.4%	53.0%	16.0%	23.4%	7.6%
ADULTS 18-25	96.2%	64.1%	17.6%	14.5%	3.8%
ADULTS 26-34	95.6%	57.0%	17.0%	21.5%	4.4%
ADULTS 35 & OLDER	83.0%	32.0%	13.0%	38.0%	17.0%
COCAINE (BOTH FORMS)	64.1%	21.5%	21.2%	21.5%	35.9%
ADULTS 18-25	67.2%	29.8%	21.4%	16.0%	32.8%
ADULTS 26-34	77.0%	20.0%	26.7%	30.4%	23.0%
ADULTS 35 & OLDER	42.0%	12.0%	13.0%	17.0%	58.0%

The maximum 95% confidence limit for White inmates on any drug is $\pm 5\%$.

APPENDIX B

Alcohol Problem Questions

Respondents who had consumed 10 or more drinks in their last year on the street were asked if they had experienced the following problems because of their drinking:

- a. felt aggressive or cross while drinking.
- b. got into a heated argument while drinking.
- c. stayed away from work or school because of a hangover.
- d. were “high” or “tight” when on the job or at school.
- e. lost a job, or nearly lost one, because of drinking.
- f. wife or girlfriend told them that they should cut down on drinking.
- g. relative (other than wife) told them that they should cut down on drinking.
- h. friends told them that they should cut down.
- I. skipped a number of regular meals while drinking.
- j. tossed down several drinks pretty fast to get a quicker effect.
- k. were afraid they were an alcoholic or that they might become one.
- l. stayed drunk for two or more days in a row.
- m. once started drinking, was difficult for them to stop before becoming completely intoxicated.
- n. have awakened unable to remember some of the things they had done while drinking the day before.
- o. had a quick drink or so when no one was looking.
- p. often took a drink the first thing when they got up in the morning.
- q. hands shook quite a lot after drinking the day before.
- r. sometimes got “high” or “tight” when drinking by themselves.
- s. sometimes kept on drinking after promising themselves not to.

Drug Problem Questions

Respondents reporting use of drugs in their last year on the street were asked if they had experienced the following problems because of their drug use.

- a. became depressed or lost interest in things because of drugs.
- b. had arguments and fights with family or friends because of drugs.
- c. had trouble at school or on the job because of drugs.
- d. driven unsafely because of drugs.
- e. experienced times when they could not remember what happened.
- f. experienced times when they felt completely alone and isolated.
- f. felt nervous and anxious because of drugs.
- h. had health problems which they thought were caused by drug use.
- i. found it difficult to think clearly.
- j. had serious money problems because of drugs.
- k. felt irritable and upset.
- l. did less work than usual at school or on the job.
- m. felt suspicious and distrustful of people.
- n. had trouble with the police because of drugs.
- o. skipped four or more regular meals in a row.
- p. found it harder to handle their problems.
- q. had to get emergency medical help as a result of drug use.

APPENDIX C

Questions About Injection

Respondents who reported lifetime, non-medical injection of substances were asked the following questions about their experiences and attitudes:

1. How old were you when you first took [name of drug] by injection?
2. When was the last time you took [name of drug] by injection?
3. (Those who had not injected within last 30 days on the street): Had you stopped using injection as a method of taking drugs before you were locked up?
4. (Those who had stopped injecting before being locked up): Why did you stop using injection as a method of taking drugs?
5. Have you ever shared a needle with someone else when you were taking drugs?
6. (Those who had shared needles): How old were you when your first shared a needle?
7. (Those who had shared needles): Did you share a needle in the 30 days before you were locked up for this offense?
8. Have you heard publicity about the AIDS virus?
9. Would you say that AIDS is reaching epidemic proportions?
10. Are you personally concerned about the possibility of contracting AIDS?
11. What do you think your chances are of contracting AIDS, are your chances high, medium, low, very low or no chance at all?

APPENDIX D

CROSS-TABULATIONS FOR FIGURE 6.4
TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY ILLEGAL INCOME

ILLEGAL INCOME
0=NONE
1=UNDER \$400/WEEK
2=OVER \$400/WEEK

	Frequency	Expected	Cell Chi-Square	Percent	Row Pct	Col Pct	0	1	2	Total
TYPE 1	262	42	110							414
	206.49	55.166	152.34							
	14.92	3.1423	11.768							
	32.03	5.13	13.45							50.61
	63.29	10.14	26.57							
	64.22	38.53	36.54							
TYPE 2	80	20	31							131
	65.34	17.456	48.204							
	3.2893	0.3708	6.1402							
	9.78	2.44	3.79							16.01
	61.07	15.27	23.66							
	19.61	18.35	10.3							
TYPE 3	29	17	26							72
	35.912	9.5941	26.494							
	1.3303	5.7167	0.0092							
	3.55	2.08	3.18							8.8
	40.28	23.61	36.11							
	7.11	15.6	8.64							
TYPE 4	37	30	134							201
	100.25	26.784	73.962							
	39.91	0.3862	48.735							
	4.52	3.67	16.38							24.57
	18.41	14.93	66.67							
	9.07	27.52	44.52							
Total	408	109	301							818
	49.88	13.33	36.8							100

Statistic	DF	Value	Prob
Chi-Square	6	135.717	0
Likelihood Ratio Chi-Square	6	139.049	0
Mantel-Haenszel Chi-Square	1	112.556	0
Phi Coefficient		0.407	
Contingency Coefficient		0.377	
Cramer's V		0.288	

Effective Sample Size = 818
Frequency Missing = 13

CROSS-TABULATIONS FOR FIGURE 6.5
EMPLOYMENT STATUS BY TYPE OF HEAVY SUBSTANCE INVOLVEMENT

	TYPE 1	TYPE 2	TYPE 3	TYPE 4	Total
UNEMPLOYED	52	18	21	70	161
	81.568	25.441	13.983	40.007	
	10.718	2.1766	3.5212	22.485	
	6.27	2.17	2.53	8.44	19.42
	32.3	11.18	13.04	43.48	
	12.38	13.74	29.17	33.98	
PART-TIME EMPLOYED	111	26	9	45	191
	96.767	30.182	16.589	47.462	
	2.0934	0.5795	3.4715	0.1277	
	13.39	3.14	1.09	5.43	23.04
	58.12	13.61	4.71	23.56	
	26.43	19.85	12.5	21.84	
FULL-TIME EMPLOYED	257	87	42	91	477
	241.66	75.376	41.428	118.53	
	0.9731	1.7925	0.0079	6.3945	
	31	10.49	5.07	10.98	57.54
	53.88	18.24	8.81	19.08	
	61.19	66.41	58.33	44.17	
Total	420	131	72	206	829
	50.66	15.8	8.69	24.85	100

Statistic	DF	Value	Prob
Chi-Square	6	54.341	0
Likelihood Ratio Chi-Square	6	52.655	0
Mantel-Haenszel Chi-Square	1	33.786	0
Phi Coefficient		0.256	
Contingency Coefficient		0.248	
Cramer's V		0.181	

Effective Sample Size = 829
Frequency Missing = 2

CROSS TABULATIONS FOR FIG 6.6.1A:
TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY NUMBER OF DIFFERENT CRIMES REPORTED

NUMBER OF TYPES OF CRIMES REPORTED: 0,1,2 OR 3 OR MORE

	0	1	2	3	Total
TYPE 1	34	161	117	109	421
Expected	26.851	119.56	115	159.58	
Cell Chi-Square	1.9035	14.362	0.0347	16.034	
Percent	4.09	19.37	14.08	13.12	50.66
Row Pct	8.08	38.24	27.79	25.89	
Col Pct	64.15	68.22	51.54	34.6	
TYPE 2	7	36	39	49	131
Expected	8.355	37.203	35.785	49.657	
Cell Chi-Square	0.2197	0.0389	0.2889	0.0087	
Percent	0.84	4.33	4.69	5.9	15.76
Row Pct	5.34	27.48	29.77	37.4	
Col Pct	13.21	15.25	17.18	15.56	
TYPE 3	4	13	19	36	72
Expected	4.5921	20.448	19.668	27.292	
Cell Chi-Square	0.0763	2.7127	0.0227	2.7781	
Percent	0.48	1.56	2.29	4.33	8.66
Row Pct	5.56	18.06	26.39	50	
Col Pct	7.55	5.51	8.37	11.43	
TYPE 4	8	26	52	121	207
Expected	13.202	58.787	56.545	78.466	
Cell Chi-Square	2.0499	18.286	0.3653	23.057	
Percent	0.96	3.13	6.26	14.56	24.91
Row Pct	3.86	12.56	25.12	58.45	
Col Pct	15.09	11.02	22.91	38.41	
Total	53	236	227	315	831
	6.38	28.4	27.32	37.91	100

Statistic	DF	Value	Prob
Chi-Square	9	82.238	0
Likelihood Ratio Chi-Square	9	84.762	0
Mantel-Haenszel Chi-Square	1	72.077	0
Phi Coefficient		0.315	
Contingency Coefficient		0.3	
Cramer's V		0.182	

Sample Size = 831

CROSS-TABULATIONS FOR TYPE OF SUBSTANCE INVOLVEMENT
BY BREAKING AND ENTERING

	NO B&E	B&E	Total
TYPE 1	240	181	421
	207.21	213.79	
	5.1899	5.03	
	28.88	21.78	50.66
	57.01	42.99	
	58.68	42.89	
TYPE 2	75	56	131
	64.475	66.525	
	1.718	1.6651	
	9.03	6.74	15.76
	57.25	42.75	
	18.34	13.27	
TYPE 3	26	46	72
	35.437	36.563	
	2.513	2.4356	
	3.13	5.54	8.66
	36.11	63.89	
	6.36	10.9	
TYPE 4	68	139	207
	101.88	105.12	
	11.267	10.92	
	8.18	16.73	24.91
	32.85	67.15	
	16.63	32.94	
Total	409	422	831
	49.22	50.78	100

Statistic	DF	Value	Prob
Chi-Square	3	40.739	0
Likelihood Ratio Chi-Square	3	41.341	0
Mantel-Haenszel Chi-Square	1	36.74	0
Phi Coefficient		0.221	
Contingency Coefficient		0.216	
Cramer's V		0.221	

Sample Size = 831

CROSS-TABULATIONS FOR TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY THEFT

	NO	THEFT	Total
Frequency	282	139	421
Expected	243.18	177.82	
Cell Chi-Square	6.1981	8.476	
Percent	33.94	16.73	50.66
Row Pct	66.98	33.02	
Col Pct	58.75	39.6	
TYPE 1			
Frequency	78	53	131
Expected	75.668	55.332	
Cell Chi-Square	0.0719	0.0983	
Percent	9.39	6.38	15.76
Row Pct	59.54	40.46	
Col Pct	16.25	15.1	
TYPE 2			
Frequency	41	31	72
Expected	41.588	30.412	
Cell Chi-Square	0.0083	0.0114	
Percent	4.93	3.73	8.66
Row Pct	56.94	43.06	
Col Pct	8.54	8.83	
TYPE 3			
Frequency	79	128	207
Expected	119.57	87.433	
Cell Chi-Square	13.764	18.822	
Percent	9.51	15.4	24.91
Row Pct	38.16	61.84	
Col Pct	16.46	36.47	
TYPE 4			
Total	480	351	831
	57.76	42.24	100

Statistic	DF	Value	Prob
Chi-Square	3	47.45	0
Likelihood Ratio Chi-Square	3	47.35	0
Mantel-Haenszel Chi-Square	1	45.207	0
Phi Coefficient		0.239	
Contingency Coefficient		0.232	
Cramer's V		0.239	

Sample Size = 831

CROSS-TABULATIONS FOR TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY WEAPONS CRIME

	NO WC	WC	Total
TYPE 1	381	40	421
	350.07	70.927	
	2.7322	13.485	
	45.85	4.81	50.66
	90.5	9.5	
	55.14	28.57	
TYPE 2	109	22	131
	108.93	22.07	
	0.000045	0.0002	
	13.12	2.65	15.76
	83.21	16.79	
	15.77	15.71	
TYPE 3	56	16	72
	59.87	12.13	
	0.2502	1.2347	
	6.74	1.93	8.66
	77.78	22.22	
	8.1	11.43	
TYPE 4	145	62	207
	172.13	34.874	
	4.275	21.1	
	17.45	7.46	24.91
	70.05	29.95	
	20.98	44.29	
Total	691	140	831
	83.15	16.85	100

Statistic	DF	Value	Prob
Chi-Square	3	43.078	0
Likelihood Ratio Chi-Square	3	41.68	0
Mantel-Haenszel Chi-Square	1	42.964	0
Phi Coefficient		0.228	
Contingency Coefficient		0.222	
Cramer's V		0.228	

Sample Size = 831

CROSS-TABULATIONS FOR TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY ASSAULT

	NO ASSLT	ASSLT	Total
TYPE 1	313	108	421
	285.23	135.77	
	2.7045	5.6814	
	37.67	13	50.66
	74.35	25.65	
	55.6	40.3	
TYPE 2	80	51	131
	88.752	42.248	
	0.8631	1.8131	
	9.63	6.14	15.76
	61.07	38.93	
	14.21	19.03	
TYPE 3	43	29	72
	48.78	23.22	
	0.6848	1.4387	
	5.17	3.49	8.66
	59.72	40.28	
	7.64	10.82	
TYPE 4	127	80	207
	140.24	66.758	
	1.2503	2.6266	
	15.28	9.63	24.91
	61.35	38.65	
	22.56	29.85	
Total	563	268	831
	67.75	32.25	100

Statistic	DF	Value	Prob
Chi-Square	3	17.062	0.001
Likelihood Ratio Chi-Square	3	17.133	0.001
Mantel-Haenszel Chi-Square	1	12.521	0
Phi Coefficient		0.143	
Contingency Coefficient		0.142	
Cramer's V		0.143	

Sample Size = 831

CROSS-TABULATIONS FOR TYPE OF HEAVY SUBSTANCE INVOLVEMENT
BY PROPERTY DESTRUCTION

	NO PD	PD	Total
TYPE 1	340	81	421
	298.4	122.6	
	5.8	14.116	
	40.91	9.75	50.66
	80.76	19.24	
	57.72	33.47	
TYPE 2	87	44	131
	92.851	38.149	
	0.3687	0.8973	
	10.47	5.29	15.76
	66.41	33.59	
	14.77	18.18	
TYPE 3	46	26	72
	51.032	20.968	
	0.4963	1.2079	
	5.54	3.13	8.66
	63.89	36.11	
	7.81	10.74	
TYPE 4	116	91	207
	146.72	60.282	
	6.4315	15.654	
	13.96	10.95	24.91
	56.04	43.96	
	19.69	37.6	
Total	589	242	831
	70.88	29.12	100

Statistic	DF	Value	Prob
Chi-Square	3	44.972	0
Likelihood Ratio Chi-Square	3	44.921	0
Mantel-Haenszel Chi-Square	1	42.948	0
Phi Coefficient		0.233	
Contingency Coefficient		0.227	
Cramer's V		0.233	

Sample Size = 831

CROSS-TABULATIONS FOR TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY OTHER CRIMES

	NO	OTHER	Total
TYPE 1	190	231	421
	196.06	224.94	
	0.1874	0.1633	
	22.86	27.8	50.66
	45.13	54.87	
	49.1	52.03	
TYPE 2	56	75	131
	61.007	69.993	
	0.411	0.3582	
	6.74	9.03	15.76
	42.75	57.25	
	14.47	16.89	
TYPE 3	34	38	72
	33.531	38.469	
	0.0066	0.0057	
	4.09	4.57	8.66
	47.22	52.78	
	8.79	8.56	
TYPE 4	107	100	207
	96.401	110.6	
	1.1654	1.0158	
	12.88	12.03	24.91
	51.69	48.31	
	27.65	22.52	
Total	387	444	831
	46.57	53.43	100

Statistic	DF	Value	Prob
Chi-Square	3	3.313	0.346
Likelihood Ratio Chi-Square	3	3.311	0.346
Mantel-Haenszel Chi-Square	1	2.345	0.126
Phi Coefficient		0.063	
Contingency Coefficient		0.063	
Cramer's V		0.063	

Sample Size = 831

CROSS TABULATIONS FOR SECTION 6.6.2

TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY INTENSITY OF BREAKING AND ENTERING

- 1=INFREQUENT PERPETRATORS
- 2=OCCASIONAL PERPETRATORS
- 3=REPEATED PERPETRATORS
- 4=HABITUAL PERPETRATORS

	Frequency	Expected	Cell Chi-Square	Percent	Row Pct	Col Pct	1	2	3	4	Total
Type 1	135	20	15	11							181
	111.95	28.308	22.732	18.014							
	4.7479	2.4383	2.6301	2.7311							
	31.99	4.74	3.55	2.61							42.89
	74.59	11.05	8.29	6.08							
	51.72	30.3	28.3	26.19							
Type 2	37	7	6	6							56
	34.635	8.7583	7.0332	5.5735							
	0.1615	0.353	0.1518	0.0326							
	8.77	1.66	1.42	1.42							13.27
	66.07	12.5	10.71	10.71							
	14.18	10.61	11.32	14.29							
Type 3	26	9	6	5							46
	28.45	7.1943	5.7773	4.5782							
	0.211	0.4532	0.0086	0.0389							
	6.16	2.13	1.42	1.18							10.9
	56.52	19.57	13.04	10.87							
	9.96	13.64	11.32	11.9							
Type 4	63	30	26	20							139
	85.969	21.739	17.457	13.834							
	6.1369	3.1389	4.1803	2.7481							
	14.93	7.11	6.16	4.74							32.94
	45.32	21.58	18.71	14.39							
	24.14	45.45	49.06	47.62							
Total	261	66	53	42							422
	61.85	15.64	12.56	9.95							100

Statistic	DF	Value	Prob
Chi-Square	9	30.162	0
Likelihood Ratio Chi-Square	9	30.366	0
Mantel-Haenszel Chi-Square	1	23.799	0
Phi Coefficient		0.267	
Contingency Coefficient		0.258	
Cramer's V		0.154	

Effective Sample Size = 422
 Frequency Missing = 409
 NB: 49% of data missing.

TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY INTENSITY OF THEFT

1=INFREQUENT PERPETRATORS
 2=OCCASIONAL PERPETRATORS
 3=REPEATED PERPETRATORS
 4=HABITUAL PERPETRATORS

	Frequency	Expected	Cell Chi-Square	Percent	Row Pct	Col Pct	1	2	3	4	Total
Type 1	87	36	11	5							139
	72.866	28.909	22.969	14.256							
	2.7416	1.7394	6.2367	6.01							
	24.79	10.26	3.13	1.42							39.6
	62.59	25.9	7.91	3.6							
47.28	49.32	18.97	13.89								
Type 2	33	7	9	4							53
	27.783	11.023	8.7578	5.4359							
	0.9794	1.4681	0.0067	0.3793							
	9.4	1.99	2.56	1.14							15.1
	62.26	13.21	16.98	7.55							
17.93	9.59	15.52	11.11								
Type 3	16	8	7	0							31
	16.251	6.4473	5.1225	3.1795							
	0.0039	0.3739	0.6881	3.1795							
	4.56	2.28	1.99	0							8.83
	51.61	25.81	22.58	0							
8.7	10.96	12.07	0								
Type 4	48	22	31	27							128
	67.1	26.621	21.151	13.128							
	5.4367	0.8022	4.5862	14.658							
	13.68	6.27	8.83	7.69							36.47
	37.5	17.19	24.22	21.09							
26.09	30.14	53.45	75								
Total	184	73	58	36							351
	52.42	20.8	16.52	10.26							100

Statistic	DF	Value	Prob
Chi-Square	9	49.289	0
Likelihood Ratio Chi-Square	9	52.424	0
Mantel-Haenszel Chi-Square	1	35.364	0
Phi Coefficient		0.375	
Contingency Coefficient		0.351	
Cramer's V		0.216	

Effective Sample Size = 351
 Frequency Missing = 480
 NB: 58% of data missing.

TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY INTENSITY OF CRIMES USING WEAPONS

- 1=INFREQUENT PERPETRATORS
- 2=OCCASIONAL PERPETRATORS
- 3=REPEATED PERPETRATORS
- 4=HABITUAL PERPETRATORS

Frequency Expected Cell Chi-Square Percent Row Pct Col Pct	1	2	3	4	Total
Type 1	37	2	1	0	40
	29.143	5.4286	4	1.4286	
	2.1183	2.1654	2.25	1.4286	
	26.43	1.43	0.71	0	28.57
	92.5	5	2.5	0	
	36.27	10.53	7.14	0	
Type 2	20	1	0	1	22
	16.029	2.9857	2.2	0.7857	
	0.984	1.3206	2.2	0.0584	
	14.29	0.71	0	0.71	15.71
	90.91	4.55	0	4.55	
	19.61	5.26	0	20	
Type 3	13	3	0	0	16
	11.657	2.1714	1.6	0.5714	
	0.1547	0.3162	1.6	0.5714	
	9.29	2.14	0	0	11.43
	81.25	18.75	0	0	
	12.75	15.79	0	0	
Type 4	32	13	13	4	62
	45.171	8.4143	6.2	2.2143	
	3.8406	2.4992	7.4581	1.4401	
	22.86	9.29	9.29	2.86	44.29
	51.61	20.97	20.97	6.45	
	31.37	68.42	92.86	80	
Total	102	19	14	5	140
	72.86	13.57	10	3.57	100

Statistic	DF	Value	Prob
Chi-Square	9	30.406	0
Likelihood Ratio Chi-Square	9	36.05	0
Mantel-Haenszel Chi-Square	1	20.773	0
Phi Coefficient		0.466	
Contingency Coefficient		0.422	
Cramer's V		0.269	

Effective Sample Size = 140

Frequency Missing = 691

NB: 83% of data missing.

NB: 56% of the cells have expected frequencies of less than 5. Chi-Square may not be a valid test.

TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY INTENSITY OF ASSAULT

- 1=INFREQUENT PERPETRATORS
- 2=OCCASIONAL PERPETRATORS
- 3=REPEATED PERPETRATORS
- 4=HABITUAL PERPETRATORS

Frequency Expected Cell Chi-Square Percent Row Pct Col Pct	1	2	3	4	Total
Type 1	86	15	6	1	108
	72.94	24.582	9.6716	0.806	
	2.3383	3.7351	1.3939	0.0467	
	32.09	5.6	2.24	0.37	40.3
	79.63	13.89	5.56	0.93	
	47.51	24.59	25	50	
Type 2	36	11	4	0	51
	34.444	11.608	4.5672	0.3806	
	0.0703	0.0319	0.0704	0.3806	
	13.43	4.1	1.49	0	19.03
	70.59	21.57	7.84	0	
	19.89	18.03	16.67	0	
Type 3	18	9	2	0	29
	19.586	6.6007	2.597	0.2164	
	0.1284	0.8721	0.1372	0.2164	
	6.72	3.36	0.75	0	10.82
	62.07	31.03	6.9	0	
	9.94	14.75	8.33	0	
Type 4	41	26	12	1	80
	54.03	18.209	7.1642	0.597	
	3.1423	3.3335	3.2642	0.272	
	15.3	9.7	4.48	0.37	29.85
	51.25	32.5	15	1.25	
	22.65	42.62	50	50	
Total	181	61	24	2	268
	67.54	22.76	8.96	0.75	100

Statistic	DF	Value	Prob
Chi-Square	9	19.433	0.022
Likelihood Ratio Chi-Square	9	19.949	0.018
Mantel-Haenszel Chi-Square	1	14.455	0
Phi Coefficient		0.269	
Contingency Coefficient		0.26	
Cramer's V		0.155	

Effective Sample Size = 268

Frequency Missing = 563

NB: 68% of data missing.

NB: 38% of the cells have expected frequencies of less than 5. Chi-Square may not be a valid test.

TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY INTENSITY OF PROPERTY DESTRUCTION

- 1=INFREQUENT PERPETRATORS
- 2=OCCASIONAL PERPETRATORS
- 3=REPEATED PERPETRATORS
- 4=HABITUAL PERPETRATORS

	Frequency	Expected	Cell Chi-Square	Percent	Row Pct	Col Pct	1	2	3	4	Total
Type 1	62	9	8	2							81
	48.198	18.744	10.041	4.0165							
	3.9521	5.0652	0.415	1.0124							
	25.62	3.72	3.31	0.83							33.47
	76.54	11.11	9.88	2.47							
	43.06	16.07	26.67	16.67							
Type 2	30	9	4	1							44
	26.182	10.182	5.4545	2.1818							
	0.5568	0.1372	0.3879	0.6402							
	12.4	3.72	1.65	0.41							18.18
	68.18	20.45	9.09	2.27							
	20.83	16.07	13.33	8.33							
Type 3	15	9	2	0							26
	15.471	6.0165	3.2231	1.2893							
	0.0143	1.4794	0.4642	1.2893							
	6.2	3.72	0.83	0							10.74
	57.69	34.62	7.69	0							
	10.42	16.07	6.67	0							
Type 4	37	29	16	9							91
	54.149	21.058	11.281	4.5124							
	5.431	2.9954	1.974	4.4629							
	15.29	11.98	6.61	3.72							37.6
	40.66	31.87	17.58	9.89							
	25.69	51.79	53.33	75							
Total	144	56	30	12							242
	59.5	23.14	12.4	4.96							100

Statistic	DF	Value	Prob
Chi-Square	9	30.277	0
Likelihood Ratio Chi-Square	9	31.902	0
Mantel-Haenszel Chi-Square	1	19.348	0
Phi Coefficient		0.354	
Contingency Coefficient		0.333	
Cramer's V		0.204	

Effective Sample Size = 242

Frequency Missing = 589

NB: 71% of data missing.

NB: 31% of the cells have expected frequencies of less than 5. Chi-Square may not be a valid test.

TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY INTENSITY OF OTHER CRIMES

- 1=INFREQUENT PERPETRATORS
- 2=OCCASIONAL PERPETRATORS
- 3=REPEATED PERPETRATORS
- 4=HABITUAL PERPETRATORS

Frequency	Expected	Cell Chi-Square	Percent	Row Pct	Col Pct	1	2	3	4	Total
Type 1	174	35	6	16	231	145.68	48.905	8.3243	28.095	
	5.5072	3.9538	0.649	5.2067		39.19	7.88	1.35	3.6	52.03
	75.32	15.15	2.6	6.93		62.14	37.23	37.5	29.63	
Type 2	39	29	3	4	75	47.297	15.878	2.7027	9.1216	
	1.4556	10.843	0.0327	2.8757		8.78	6.53	0.68	0.9	16.89
	52	38.67	4	5.33		13.93	30.85	18.75	7.41	
Type 3	26	9	1	2	38	23.964	8.045	1.3694	4.6216	
	0.173	0.1134	0.0996	1.4871		5.86	2.03	0.23	0.45	8.56
	68.42	23.68	2.63	5.26		9.29	9.57	6.25	3.7	
Type 4	41	21	6	32	100	63.063	21.171	3.6036	12.162	
	7.7189	0.0014	1.5936	32.358		9.23	4.73	1.35	7.21	22.52
	41	21	6	32		14.64	22.34	37.5	59.26	
Total	280	94	16	54	444	63.06	21.17	3.6	12.16	100

Statistic	DF	Value	Prob
Chi-Square	9	74.069	0
Likelihood Ratio Chi-Square	9	65.054	0
Mantel-Haenszel Chi-Square	1	44.597	0
Phi Coefficient		0.408	
Contingency Coefficient		0.378	
Cramer's V		0.236	

Effective Sample Size = 444

Frequency Missing = 387

NB: 47% of data missing.

NB: 25% of the cells have expected frequencies of less than 5. Chi-Square may not be a valid test.

CROSS-TABULATIONS FOR TYPE OF HEAVY SUBSTANCE INVOLVEMENT BY RECIDIVISM

	NO REC.	REC.	Total
Type 1	256	164	420
	235.49	184.51	
	1.7871	2.2808	
	31.07	19.9	50.97
	60.95	39.05	
	55.41	45.3	
Type 2	81	49	130
	72.888	57.112	
	0.9027	1.1521	
	9.83	5.95	15.78
	62.31	37.69	
	17.53	13.54	
Type 3	40	31	71
	39.808	31.192	
	0.0009	0.0012	
	4.85	3.76	8.62
	56.34	43.66	
	8.66	8.56	
Type 4	85	118	203
	113.82	89.182	
	7.2965	9.3121	
	10.32	14.32	24.64
	41.87	58.13	
	18.4	32.6	
Total	462	362	824
	56.07	43.93	100

Statistic	DF	Value	Prob
Chi-Square	3	22.734	0
Likelihood Ratio Chi-Square	3	22.642	0
Mantel-Haenszel Chi-Square	1	18.97	0
Phi Coefficient		0.166	
Contingency Coefficient		0.164	
Cramer's V		0.166	

Effective Sample Size = 824
 Frequency Missing = 7

CROSS-TABULATIONS FOR FIGURE 6.8: TYPE OF HEAVY SUBSTANCE INVOLVEMENT
BY TYPE OF OFFENSE OF RECORD

- 1=CRIME AGAINST PERSON
- 2=CRIME AGAINST PROPERTY
- 3=DRUG CRIME
- 4=MISCELLANEOUS CRIME

	Frequency	Expected	Cell Chi-Square	Percent	Row Pct	Col Pct	1	2	3	4	Total
Type 1	79	189	106	43							417
	78.727	200.12	99.044	39.11							
	0.0009	0.6178	0.4886	0.387							
	9.62	23.02	12.91	5.24							50.79
	18.94	45.32	25.42	10.31							
	50.97	47.97	54.36	55.84							
Type 2	33	53	20	24							130
	24.543	62.387	30.877	12.192							
	2.9139	1.4125	3.8316	11.435							
	4.02	6.46	2.44	2.92							15.83
	25.38	40.77	15.38	18.46							
	21.29	13.45	10.26	31.17							
Type 3	11	38	16	6							71
	13.404	34.073	16.864	6.659							
	0.4313	0.4526	0.0442	0.0652							
	1.34	4.63	1.95	0.73							8.65
	15.49	53.52	22.54	8.45							
	7.1	9.64	8.21	7.79							
Type 4	32	114	53	4							203
	38.325	97.42	48.216	19.039							
	1.0439	2.8217	0.4748	11.879							
	3.9	13.89	6.46	0.49							24.73
	15.76	56.16	26.11	1.97							
	20.65	28.93	27.18	5.19							
Total	155	394	195	77							821
	18.88	47.99	23.75	9.38							100

Statistic	DF	Value	Prob
Chi-Square	9	38.3	0
Likelihood Ratio Chi-Square	9	41.719	0
Mantel-Haenszel Chi-Square	1	2.815	0.093
Phi Coefficient		0.216	
Contingency Coefficient		0.211	
Cramer's V		0.125	

Effective Sample Size = 821
Frequency Missing = 10