The National Inmate Survey (NIS) and Drug Use, Substance Use Disorders, and Treatment among Prisoners and Jail Inmates

10th Academic & Health Policy Conference on Correctional Health
Atlanta, GA

March 16, 2017

Jennifer Bronson, PhD
Statistician, Bureau of Justice Statistics
Presentation Overview

• Overview of BJS

• PREA and correctional health data
  • National Inmate Survey (NIS)

• Forthcoming BJS illicit drug use report
  • Drug use and substance use disorder estimates
Bureau of Justice Statistics (BJS)

• Statistical agency of the U.S. Department of Justice.
• BJS was established on December 27, 1979.
• Mission → to collect, analyze, publish, and disseminate information on crime, criminal offenders, victims of crime, and the operation of justice systems.
• BJS does NOT make policies, or provide oversight or monitoring of correctional facility operations.
• BJS publications, web tools, and data collections are available at www.bjs.gov.
Prison Rape Elimination Act of 2003 (PREA)

• PREA requires BJS to
  • “Carry out, for each calendar year, a comprehensive statistical report and analysis of the incidence and effects of prison rape”.

  • “The report shall include … a listing of those institutions … ranked according to the incidence of prison rape in each institution... and a listing of any prisons … that did not cooperate with the survey”.

• As part of PREA, BJS developed the National Inmate Survey (NIS).
The NIS Alternative Surveys

• For privacy reasons the NIS, utilizes an alternative survey (AS) in addition to the sexual victimization survey (SVS).

• Respondents are randomly assigned by the computer to complete either the SVS or AS.
  • The proportion of respondents randomized to the AS was between 5 or 10%.

• Both surveys were designed to take 35 minutes to complete.

• Items on the AS include questions on past drug and alcohol use, substance use disorders, mental health, physical health, disabilities, and treatment and health care for health problems.
The National Inmate Survey (NIS)

• Gathers data on the prevalence and incidence of sexual assault as reported by persons in prison and jail.

• ACASI

<table>
<thead>
<tr>
<th>Sample</th>
<th>State prisoners</th>
<th>Jail inmates</th>
</tr>
</thead>
<tbody>
<tr>
<td>NIS-1 (2007)</td>
<td>22,943 (127 prisons)</td>
<td>45,414 (282 jails)</td>
</tr>
<tr>
<td>NIS-2 (2008-09)</td>
<td>28,749 (148 prisons)</td>
<td>48,066 (286 jails)</td>
</tr>
</tbody>
</table>
Title: “Trends in illicit drug use, substance use disorders and treatment among state prisoners and jail inmates, 2002-2009”

Background:
• Latest BJS report on inmate drug use in over a decade.
• Utilizes the most recent BJS data available on inmate drug use.

Purpose:
• To examine patterns of illicit drug use among state prisoners and jail inmates.
• To estimate the percentage of inmates who met the DSM-IV criteria for a substance use disorder (SUD).
• To estimate the percentage of inmates who met the criteria for a SUD and who participated in a drug treatment/program.
• Make comparisons to the non-institutionalized, adult general population.
“Drug use” Report - Data Sources

1. Inmate estimates (adults ages 18+):

2. Inmate trends:
   • Survey of Prison Inmates (SPI) (2004)
   • Survey of Inmates in Local Jails (SILJ) (2002)

3. General population (adults ages 18+):
   • National Survey of Drug Use and Health (NSDUH) (2008-2009)
     combined years (*standardized*)
“Drug use” Report - Drug Types

- Marijuana/hashish
- Cocaine/crack
- Heroin/opiates
- Depressants (includes barbiturates, tranquilizers and Quaaludes)
- Stimulants (includes amphetamine and methamphetamine)
- Methamphetamine
- Hallucinogens (includes LSD, PCP, and ecstasy).
- Inhalants
Section J – Drug Use (ACASI)

These next questions are about using drugs other than alcohol.

Have you *ever* used...

<table>
<thead>
<tr>
<th>Question</th>
<th>YES</th>
<th>NO</th>
</tr>
</thead>
<tbody>
<tr>
<td>J1a. Heroin?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1b. Other opiates, for example, darvon or percocet without a doctor’s prescription or methadone outside a treatment program?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1c. Methamphetamine such as ice or crank?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1d. Other amphetamines such as speed without a doctor’s prescription?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1e. Methaqualone such as quaaludes without a doctor’s prescription?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1f. Barbiturates such as downers without a doctor’s prescription?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1g. Tranquilizers such as valium without a doctor’s prescription?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1h. Crack?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1i. Cocaine other than crack?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1j. PCP?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1k. Ecstasy?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1l. LSD or other hallucinogens?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1m. Marijuana or hashish?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1n. Any other drugs that we didn’t mention?</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>J1o. Inhalants or sniffed substances to get high, for example nitrous oxide, aerosols, paint thinner, glue, lighter fluid, spray paint, or gasoline?</td>
<td>1</td>
<td>2</td>
</tr>
</tbody>
</table>
“Drug use” Report - Substance Use Disorders

• DSM-IV criteria for dependence and abuse
  • A diagnosis of substance dependence or abuse is based on clusters of behaviors and physiological effects that occur in a given time.
  • The diagnosis of dependence takes precedent over abuse.
    • A diagnosis of abuse is made if dependence criteria was not met.
    • Diagnosis of dependence or abuse should be substance-based.

• NIS
  • Self-report of symptoms.
    • “During the year before you were admitted to the current facility…”
## DSM-IV Criteria for Substance Dependence or Abuse

<table>
<thead>
<tr>
<th>Dependence – 3+ in 12 month period</th>
<th>Abuse – 1+ in 12 month period</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Tolerance</td>
<td>• Failure to fulfill major role obligations</td>
</tr>
<tr>
<td>• Withdrawal</td>
<td>• Continued use in hazardous situations</td>
</tr>
<tr>
<td>• Compulsive use</td>
<td>• Drug-related legal problems</td>
</tr>
<tr>
<td>• Impaired control</td>
<td>• Recurrent social or interpersonal problems</td>
</tr>
<tr>
<td>• Time spent obtaining, using, recovering</td>
<td></td>
</tr>
<tr>
<td>• Neglect of activities</td>
<td></td>
</tr>
<tr>
<td>• Continued use despite problems</td>
<td></td>
</tr>
</tbody>
</table>
“Drug use” Report – Measurement of Substance Use Treatment

• Treatment was defined as:
  1) living in a special facility or unit,
  2) counseling with a trained professional while not living in a special facility/unit
  3) spending up to 72 hours in a detoxification unit to “dry out”,
  4) receiving a maintenance drug to cut the high or make you sick.

• Programs were defined as a
  1) self-help or peer group counseling (e.g. Narcotics Anonymous),
  2) education or awareness program that explained the problems with drug use.
“Drug use” Report - Limitations

- Inmate self-report data
  - Methodological issues associated with collecting drug use data.
- Federal prisoners were excluded.
- Co-occurring disorders not assessed.
- Polydrug use combinations not examined.
- Alcohol excluded.
- Limited trend analysis.
- SUD estimates were based on illicit drug use as a whole, and not by illicit drug type.
“Drug use” Report – Limitations

• We don’t know…
  • duration of treatment
  • quality of treatment (i.e. culturally and linguistically appropriate?)
  • appropriateness of treatment to the individual’s needs
  • inmate’s motivation
  • case load
  • if participation in treatment was court-ordered
  • if facilities triage treatment and if so, what criteria or hierarchy they use.
  • if and how inmate co-occurring mental health problems were assessed and treated.
Thank you!

Jennifer.bronson@usdoj.gov
Deaths in Custody Reporting Program and Intoxication Deaths

Prepared by Ingrid Binswanger with Margaret Noonan
Presented by Jennifer Bronson, BJS
BJS’ Deaths in Custody Reporting Program (DCRP)

- The DCRP began in 2000, with the passage of the Deaths in Custody Act.
- Purpose - to collect individual level records on deaths in the custody of local jails and state prisons.
  - Nearly all 2800 local jails participate (about 98% annually).
  - All state departments of corrections participate.
DCRP

Information reported by facilities to BJS:
- Decedent age
- Race
- Sex
- Criminal background
- Date
- Time
- Location
- Cause of death

Section I — INMATE DEATHS

1. Between January 1, 2013, and December 31, 2013, how many persons died while under the supervision of this facility?

INCLUDE deaths of ALL persons:
- CONFINED in this facility
- UNDER THE SUPERVISION of this facility, but out to court or in a special facility not under the jurisdiction of a local or regional correctional authority (e.g., hospital, hospice, or nursing home; treatment facility; residential community center; residential work release or house arrest program; release center)
- WHILE IN TRANSIT to or from this facility while under its supervision

EXCLUDE:
- Deaths of persons in the process of arrest by your agency if they have not yet been booked into this facility. Arrest-related deaths should be reported using a CJ-11A form.

Number of inmate deaths
a. Males
b. Females
Deaths in Custody

- Approximately 3,500 deaths occur in state prison custody each year (1.2 million population).
  - Between 2001-2014, 50,785 inmates in state or federal prison died.

- Approximately 1,000 deaths in local jails per year (750,000 population)
  - 80% of jails reported no deaths in 2014.
  - Between 2000-2014, 14,786 inmate deaths were reported by jail authorities.
Review of available information on intoxication deaths in DCRP, 2014

- Jails (N=1,017 deaths)
  - About half of the cases had detailed intoxication data
  - Majority of cases involved drugs (cocaine, heroin, methamphetamines)
  - Less than 10% involved alcohol.

- Prisons (N=595 deaths)
  - About one-third of cases had detailed intoxication data
  - Prescription opioids more frequently mentioned.
U.S. general population drug overdose deaths, 2000-2014

FIGURE 1. Age-adjusted rate* of drug overdose deaths† and drug overdose deaths involving opioids§ — United States, 2000–2014

Deaths per 100,000 population

Year
Patterns of unnatural deaths in jail vs. prisons, 2001-2014

• Jails
  • 40% of deaths occur among people in custody for less than 7 days.
  • Suicide is the leading cause of death in jails (31%, n=4,508)
  • Intoxication deaths are 7% of jail deaths (n=1,017)
  • Homicides are 2% (n=327)

• Prisons
  • Intoxication deaths are 1% of prison deaths (n=595)
  • Suicide deaths are 6% (n=2,826)
  • Homicides are 2% (n=845)
Characteristics of intoxication deaths in jails and prisons

• Jails
  • About 70 intox deaths occur each year in local jails.
  • The rate increased from 6/100,000 (2013) to 12/100,000 (2014)
  • Typically occur on the first day of admission.
  • Nearly all decedents are unconvicted.

• Prisons
  • About 40 intox deaths occur each year in state prisons.
  • The rate has stayed steady (3 or 4/100,000 since 2001)
  • No clear trend on time served prior to death – ranges from months after admission to decades later.
Characteristics of intoxication deaths in jails and prisons

• Jails
  • 79% decedents are male
  • 63% are non-Hispanic, White
  • 46% are 34 or younger
  • The female intoxication mortality was twice the male intoxication rate
    • Male and female jail inmates died at nearly equal rates for all other causes.

• Prisons
  • 95% of decedents are male
  • 57% are non-Hispanic, White
  • 66% are 35 or older
  • Male and female intoxication mortality rates were nearly identical
    • Male prisoners died from other causes at higher rates than female prisoners.
How were withdrawal-related deaths counted?

• Withdrawal deaths do not contribute to DCRP based intoxication mortality rates
  • Withdrawal is physiological response to absence of substance
  • Typically counted among ‘natural’ deaths
• General knowledge has been that heroin withdrawal is not lethal, but increasing reports are challenging this narrative.
Use of the National Death Index (NDI):

- NDI: electronic database of death certificates in the United States
- Considered the ‘gold standard’
- Multiple cause-of-death coding comparable to that used in other public health surveillance efforts
- NDI would permit more accurate comparison to general population
- More detailed coding about deaths due to intoxication/withdrawal, including multiple substances involved
- Consistent coding over time
- Efficient
External causes of deaths in DCRP vs. NDI

- DCRP records were compared to the National Death Index
  - 94% of DCRP deaths had a matching record in the NDI
  - 68% match rate for illness causes
  - 85% agreement rate for external causes
    - Suicide – 93%
    - Homicides – 86%
    - Intoxication deaths – 65%
    - Accident – 64%

Zeng et al., April 2016, NCJ 249568
National deaths in custody surveillance: Considerations for public health

• Surveillance important to guide public health efforts and enhance public transparency and trust

• Coverage may be lacking for all relevant criminal justice populations, including some populations with considerably higher mortality rates
  • Community supervision
  • Arrest-related
  • Post-release
Thank you!

Jennifer.bronson@usdoj.gov