



BULLETIN ON NARCOTICS

1 and 2, 1989

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UNITED NATIONS

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DIVISION OF NARCOTIC DRUGS
Vienna

BULLETIN ON NARCOTICS

Volume XLI, Nos. 1 and 2, 1989

Double issue on drug abuse assessment

119824-
119834

U.S. Department of Justice
National Institute of Justice

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Development of an information reporting system on illicit drug use in Mexico

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ABSTRACT

In Mexico, drug abuse is considered a public health problem that is growing rapidly, especially among minors, who constitute about one half of the total population of the country. To facilitate an estimation of the drug problem and its trends in the country, the Information Reporting System on Drugs (IRSD) was established in 1986 by the Mexican Institute of Psychiatry at the request of the National Council against Addictions.

IRSD is an "event-reporting" type of information system based on two month-long cross-sectional evaluations that are made each year in June and November. Data for IRSD are gathered via a questionnaire called the individual report on drug abuse, which is completed by illicit drug users upon admission to health and criminal justice facilities and institutions at Mexico City during the evaluation periods. This article describes the objectives of IRSD, its development and its functioning, as well as some of its findings.

Introduction

Compared with other countries, Mexico has relatively low levels of drug abuse, but the problem is rapidly growing.

Drug abuse in Mexico is considered to be a public health problem about which policy makers, practitioners, researchers and the public are seriously concerned, particularly in the light of its growing dimensions among young persons, who presently constitute about one half of the country's total population [1-3].

Until 1986, data on illicit drug use in Mexico were fragmented, generated by various institutions and facilities that used their own criteria and indicators or, in some cases, had no register of the individuals they had admitted. Thus, the information available was of limited use for diagnostic or decision-making purposes [4]. Moreover, there was no comprehensive, systematic, monitoring and evaluation system with respect to illicit drug use country-wide.

This situation, coupled with an urgent need to prevent and control the many serious psychological, medical, social and other problems associated with illicit drug use in the country, brought about the creation of the Information Reporting System on Drugs (IRSD) in 1986.

The National Council against Addictions, composed of representatives of the private, public and social sectors, charged the Mexican Institute of Psychiatry with the task of developing IRSD. Thus, a central agency would be responsible for the collection of data from various sources, according to pre-defined criteria and procedures, as well as for the processing, analysis, presentation and dissemination of the relevant findings.

The starting-point of IRSD was the establishment of an up-to-date data set. All facilities and institutions dealing in any capacity with drug abuse were invited to serve as information sources that would eventually provide the basis for the estimation of trends [5].

As this system was the first of its kind in Mexico, a review was made of existing international literature on the subject and of information and experiences from other countries. It was found that the most frequently used information systems were of the "case-reporting" and "event-reporting" types [6].

The case-reporting type of system traces the history of drug abuse in every registered subject. It relies on (a) precise follow-up of each case of drug abuse; (b) a capacity to monitor the problem as it evolves; and (c) the willingness of subjects to provide factual information about their drug abuse. This type of system was not considered to be feasible for Mexico, where illicit drug use may result in severe social stigmatization and is, therefore, characterized by secrecy. Drug users are rarely willing to identify themselves as such, for example, by seeking assistance or entering treatment centres. A pattern of secrecy is particularly pervasive among the lower socio-economic levels of the population, where there is great distrust of official institutions.

The event-reporting type of system was chosen because of what were considered to be its advantageous characteristics and suitability for Mexico. This type of system relies on data based on the registration and reporting of facts or events that are associated with, and are indirect indicators of, illicit drug use (e.g. hospitalization, accidents, arrests) [6]. Illicit drug users admitted to and registered by the health and criminal justice facilities and institutions during the evaluation periods are counted regardless of the offence, injury or health problem for which they were admitted. With this type of system, the number of actual drug-related events can be higher (but not lower) than reported, and a significant amount of underreporting may result [7, 8].

The event-reporting type of system is widely used in many countries because it provides up-to-date information and identifies numerous factors related to the illicit drug problem, such as most frequently used drugs, consumption patterns, new drugs and populations at risk [9-11]. It is based on minimal criteria, which means: (a) there is a minimum set of variables needed for the functioning of the system; and (b) all participating facilities and institutions register and report the same variables, adding variables as

necessary. Moreover, the costs of implementing it are low; and highly specialized personnel and equipment, which are not readily available in Mexico, are not required.

Objectives of the system

The main purpose of IRSD is to determine overall trends of the illicit drug use problem at a given point in time and in the course of its evolution, as part of the epidemiological surveillance system on drugs in Mexico [7]. Its specific objectives are: (a) to identify drugs and patterns of illicit use; (b) to identify the socio-demographic characteristics of the users; (c) to identify the main associated problems; (d) to identify changes in the trends of drug use, through periodical evaluations; and (e) to maintain confidentiality of the data set.

IRSD compiles information on the following geographical areas: (a) Mexico City and the surrounding area; (b) areas near the border of the United States of America and tourist sites, where there is evidence of the highest illicit drug use; and (c) the entire country.

Design and use of the questionnaire

IRSD gathers information via a questionnaire called the individual report on drug abuse, which was developed:

(a) By reviewing research information related to drug use provided by Mexican health and criminal justice facilities and institutions; this information permitted the identification of relevant variables to be considered for problem evaluation in the Mexican context;

(b) By reviewing information from other countries with information reporting systems on drugs (e.g. Canada and the United States) [7, 10-12];

(c) By reviewing variables recommended by the World Health Organization.

The questionnaire was designed with a view to facilitating its administration by personnel with limited training who register drug users admitted to facilities and institutions falling under the auspices of the health care system (e.g. emergency rooms, drug treatment centres, psychiatric wards, the Red Cross) and justice administration (e.g. correctional facilities). It has separate sections for gathering the following information: (a) identification: schedule number; date; and facility or institution; (b) demographic information: sex; age; marital status; highest educational level completed; occupation; and socio-economic level; (c) reason for admission; (d) problems associated with drug use; (e) drug abuse: types of drug abused at least once in the individual's lifetime, in the past year and in the past month; current drug use; and the age at which each type of drug was first used. From each participating facility and institution, other information, such as the total number of admissions, population coverage etc., is also gathered.

The questionnaire is completed in participating facilities and institutions by individuals who have (a) used any prescribed drug for deliberate intoxication at least once in their lifetime; and (b) entered a facility or institution during an evaluation period, regardless of the offence, injury or health problem constituting the reason for admittance.

After the questionnaire was evaluated in a pilot study in 1986, a modified version of it was developed. This was used successfully in the first half of 1987 and, following further modification, in the second half of 1987. The questionnaire may be modified even further on the basis of ongoing experience in dealing with the illicit drug situation in Mexico and as additional knowledge about illicit drug use in the country is acquired.

Method

IRSD is based on two 30-day cross-sectional evaluations that are made each year in June and November enabling an estimation of trends in the illicit drug problem at a particular point in time and in the course of its evolution.

The interviewers who administer the questionnaire are part of the regular staff of the participating facilities and institutions. The number of interviews is determined according to the particular circumstances of each institution (e.g. case-load, staff availability, working hours). There is a supervisor for each group of interviewers.

The Mexican Institute of Psychiatry trains all interviewers in subjects related to the overall functioning of IRSD, such as the proper administration of the questionnaire, interviewing techniques and the identification of specific drugs and their effects. Once they have undergone training, the interviewers themselves are able to train others.

Each individual admitted to the participating facility or institution during the evaluation periods is asked if he or she has ever deliberately used any drug for the purpose of intoxication. If the answer is affirmative, an interview is conducted. Instances involving accidental intoxication in the workplace or at home (e.g. accidental child intoxication) are not included in the data.

After the data have been collected, they are transmitted to the Mexican Institute of Psychiatry for processing and analysis and a report is prepared [13-15]. The report is presented to participating facilities and institutions and to those responsible for prevention and treatment policy-making.

Results

Since IRSD was set up in 1986, three evaluations have been carried out; these have covered 42 facilities and institutions. Some 1,500 cases involving deliberate intoxication have been reported.

The results presented below were derived from the most recent evaluation, which was carried out in November 1987; they are based on data from 42 facilities and institutions, which reported a total of 411 cases. For some variables, comparisons with previous evaluations are made in order to provide a base for interpreting the data.

Demographic data on recorded cases

Although the majority of the drug users were male, the percentage of female users increased over previous evaluation periods (see table 1).

In almost one half of the cases recorded, the ages of the drug users ranged from 15 to 19. The next largest group comprised those aged 20-24. The percentage of children under 12 years of age increased slightly over each evaluation period. These findings are similar to other research results, in which the highest risk group was between the ages of 15 and 19 [13, 16]. Also, there is evidence that minors constitute a substantial group of drug consumers [13, 17].

Table 1
Demographic characteristics of the cases recorded by the system, 1986-1987
(Percentage)

| Variable | 1987 | | | Mean (N = 1 500) |
|------------------------------------|-------------------|-------------------|-----------------------|---------------------|
| | 1986 (N = 608) | June (N = 481) | November (N = 411) | |
| Sex | | | | |
| Male | 93.1 | 89.2 | 86.4 | 89.6 |
| Female | 6.8 | 10.8 | 13.6 | 10.4 |
| Age group | | | | |
| Under 12 | 0.5 | 0.8 | 1.2 | 0.8 |
| 12-14 | 10.0 | 11.0 | 12.0 | 11.0 |
| 15-19 | 55.4 | 40.7 | 45.1 | 47.1 |
| 20-24 | 16.6 | 25.8 | 20.2 | 20.9 |
| 25-29 | 11.6 | 11.2 | 11.5 | 11.4 |
| 30 or over | 5.7 | 10.4 | 10.0 | 8.7 |
| Socio-economic level | | | | |
| Upper | 2.5 | 1.1 | 1.4 | 1.7 |
| Middle | 28.4 | 26.6 | 40.5 | 31.8 |
| Lower | 69.1 | 72.3 | 58.1 | 66.5 |
| Educational level | | | | |
| Uneducated | 3.4 | 4.7 | 2.6 | 3.5 |
| Primary school | | | | |
| Not completed | 22.5 | 24.3 | 24.2 | 23.6 |
| Completed | 20.5 | 18.0 | 25.3 | 21.2 |
| Middle school | | | | |
| Not completed | 33.0 | 28.3 | 24.9 | 28.7 |
| Completed | 9.4 | 11.7 | 7.1 | 9.4 |
| Secondary or technical school | 9.0 | 9.7 | 10.8 | 9.8 |
| University studies | 2.2 | 3.3 | 5.2 | 3.5 |
| Employment status | | | | |
| Unemployed | 29.5 | 29.1 | 25.7 | 28.1 |
| Housewife | 3.1 | 3.1 | 2.5 | 2.9 |
| Student | 7.3 | 16.1 | 8.0 | 10.4 |
| Underemployed | 44.4 | 32.2 | 36.2 | 37.6 |
| Employed, in a trade or profession | 15.7 | 19.5 | 27.6 | 20.9 |

Source: Center of Information on Drugs, Mexican Institute of Psychiatry, 1988.

Most of the recorded cases involved members of the lower socio-economic level of the population. The number of cases involving members of the middle socio-economic levels, however, increased considerably between the second and third evaluation periods (see table 1).

Nearly one half of the cases involved individuals who had never attended secondary school. The number of individuals having university-level education increased slightly with each evaluation period. Most of the individuals were unemployed.

The results were presumably influenced to some extent by the kind of facilities and institutions surveyed. In Mexico, individuals entering public health institutions tend to come from the lower or middle socio-economic levels of the population. Drug users from the higher levels usually seek help from private clinics.

Observed increases in the number of individuals from the middle socio-economic level having a relatively high education and employment status may be attributed to growing case-loads. They may also be reflective of the current economic crisis, which has made it difficult for many affected individuals to seek private services. More research is needed in this area.

User type

User types were defined as follows:

- (a) Experimental users: those who had used drugs at some point in their lives, but not in the past month;
- (b) Current users:
 - (i) Light users: those who had used drugs 1-5 days in the past month;
 - (ii) Moderate users: those who had used drugs 6-19 days in the past month;
 - (iii) Heavy users: those who had used drugs 20 days or more in the past month.

In November 1987, experimental users accounted for 28.1 per cent of the cases recorded by the system, light users 31.9 per cent, moderate users 19.5 per cent and heavy users 20.4 per cent.

Drug-use patterns

In November 1987, solvent-inhalants were the most frequent type of drug used, followed by cannabis (see table 2); use of the latter decreased significantly between the second and third evaluation periods, perhaps as a result of intensified efforts to crack down on illicit trafficking organizations.

The third most frequently used drug was tranquillizers. Even though all the drugs reported were used primarily by males, tranquillizers were also very frequently used by females. Medically prescribed drugs and solvent-inhalants were the drugs most used by females.

The number of individuals who had used opiates other than heroin, but not in the past month, diminished over each evaluation period; and the number of those who had used stimulants, but not in the past month, decreased between the second and third evaluation periods.

The use of hallucinogens increased considerably between the second and third evaluation periods. The number of individuals who had used cocaine, but not in the past month, increased over each evaluation period, especially between the first and second periods (see table 2).

Table 2
Trends in experimental use, by drug type, 1986-1987
(Percentage)

| Drug type | 1987 | | | Mean (N = 1 500) |
|-----------------------------|-------------------|-------------------|-----------------------|---------------------|
| | 1986 (N = 608) | June (N = 481) | November (N = 411) | |
| Amphetamine-type substances | 5.0 | 9.4 | 3.4 | 5.9 |
| Cannabis | 63.6 | 70.8 | 58.6 | 64.3 |
| Cocaine | 1.6 | 3.5 | 3.9 | 3.0 |
| Hallucinogens | 3.9 | 2.1 | 6.1 | 4.0 |
| Hypnotic-sedatives | 4.7 | 2.9 | 1.5 | 3.0 |
| Opiates | | | | |
| Heroin | 0.5 | 0.8 | 0.5 | 0.6 |
| Other opiates | 0.6 | 0.2 | 0.2 | 0.3 |
| Solvent-inhalants | 57.0 | 55.3 | 59.6 | 57.3 |
| Tranquillizers | 9.2 | 13.1 | 13.1 | 11.8 |
| Other drugs | 1.8 | 4.4 | 3.7 | 3.3 |
| Alcohol | 36.6 | 42.5 | 50.6 | 43.2 |
| Tobacco | 31.7 | 40.3 | 45.7 | 39.2 |

Source: Center of Information on Drugs, Mexican Institute of Psychiatry, 1988.

Among current users, solvent-inhalants consistently ranked first, followed by cannabis, tranquillizers and hallucinogens. Current use of all drugs decreased or remained stable between the second and third evaluation periods (see table 3).

Cannabis and cocaine were most often first used by individuals between the ages of 15 and 19 (see table 4). Use of solvent-inhalants typically began at an earlier age (12-14). Use of hallucinogens, amphetamines and tranquillizers typically began much later (ages 20-24).

Solvent-inhalants

The percentage of female users of solvent-inhalants was twice that of female users of cannabis. A significant percentage of them were under 15 years of age (see table 5). Even though the solvent-inhalant users were from a socio-economic level similar to that of tranquillizer users, they had a much lower level of education and a much higher percentage of them were unemployed.

Table 3
Trends in current use, by drug type, 1986-1987
 (Percentage)

| Drug type | 1986 (N = 608) | 1987 | | Mean (N = 1 500) |
|-----------------------------|-------------------|-------------------|-----------------------|---------------------|
| | | June (N = 481) | November (N = 411) | |
| Amphetamine-type substances | 3.6 | 2.9 | 1.2 | 2.5 |
| Cannabis | 41.1 | 49.9 | 34.3 | 41.7 |
| Cocaine | 1.3 | 2.1 | 1.2 | 1.5 |
| Hallucinogens | 2.7 | 2.1 | 2.4 | 2.4 |
| Hypnotic-sedatives | 3.1 | 2.9 | 1.0 | 2.3 |
| Opiates | | | | |
| Heroin | 0.1 | 0.4 | 0.2 | 0.2 |
| Other opiates | 0.6 | 0.2 | 0.2 | 0.3 |
| Solvent-inhalants | 42.4 | 45.3 | 44.3 | 44.0 |
| Tranquillizers | 5.4 | 9.4 | 7.8 | 7.7 |
| Other drugs | 1.3 | 4.4 | 1.2 | 2.3 |
| Alcohol | 24.8 | 42.5 | 35.0 | 36.4 |
| Tobacco | 23.6 | 40.3 | 40.1 | 34.6 |

Source: Center of Information on Drugs, Mexican Institute of Psychiatry, 1988.

Table 4
User profile by drug type, November 1987
 (Percentage)

| Variable | Solvent-inhalants (N = 245) | Cannabis (N = 241) | Tranquillizers (N = 54) | Cocaine (N = 16) |
|-------------------|--------------------------------|-----------------------|----------------------------|---------------------|
| Age of first use | | | | |
| Under 12 | 10.0 | 2.8 | — | — |
| 12-14 | 40.9 | 28.6 | 10.8 | 7.7 |
| 15-19 | 41.4 | 54.9 | 40.5 | 61.5 |
| 20-24 | 4.1 | 8.9 | 24.3 | 15.4 |
| 25-29 | 2.7 | 2.8 | 5.4 | 15.4 |
| 30 and over | 0.9 | 2.0 | 10.8 | — |
| Year of first use | | | | |
| Before 1970 | 0.9 | 1.9 | 5.6 | — |
| 1970-1972 | 0.5 | 2.9 | — | — |
| 1973-1975 | 5.0 | 5.2 | — | 15.4 |
| 1976-1978 | 6.4 | 9.5 | 8.3 | — |
| 1979-1981 | 9.5 | 13.8 | 11.2 | 7.7 |
| 1982-1984 | 18.3 | 22.4 | 27.8 | 15.4 |
| 1985-1987 | 59.4 | 44.3 | 47.2 | 61.5 |
| User type | | | | |
| Experimental | 25.1 | 30.3 | 34.7 | 66.7 |
| Light | 35.0 | 24.9 | 34.7 | 13.3 |
| Moderate | 21.8 | 19.1 | 22.4 | 13.3 |
| Heavy | 18.1 | 25.7 | 8.2 | 6.7 |

Source: Center of Information on Drugs, Mexican Institute of Psychiatry, 1988.

Table 5
Demographic characteristics by drug type, November 1987
 (Percentage)

| Variable | Solvent-inhalants (N = 245) | Cannabis (N = 241) | Tranquillizers (N = 54) | Cocaine (N = 16) |
|------------------------------------|--------------------------------|-----------------------|----------------------------|---------------------|
| Sex | | | | |
| Male | 87.8 | 93.8 | 70.4 | 93.8 |
| Female | 12.2 | 6.2 | 29.6 | 6.2 |
| Age | | | | |
| Under 12 | 2.0 | — | — | — |
| 12-14 | 16.7 | 6.7 | 7.4 | 6.3 |
| 15-19 | 51.4 | 43.8 | 27.8 | 25.1 |
| 20-24 | 16.3 | 25.4 | 25.9 | 31.3 |
| 25-29 | 8.7 | 14.1 | 20.4 | 25.5 |
| 30 and over | 4.9 | 10.0 | 18.5 | 12.5 |
| Marital Status | | | | |
| Single | 79.1 | 73.3 | 60.4 | 68.8 |
| Married | 11.1 | 13.8 | 26.4 | 12.5 |
| Not married but living together | 9.0 | 12.5 | 9.4 | 12.5 |
| Divorced | 0.8 | 0.4 | — | 6.3 |
| Widowed | — | — | 3.8 | — |
| Socio-economic level | | | | |
| Lower | 64.1 | 53.3 | 66.7 | 13.3 |
| Middle | 35.9 | 44.4 | 33.3 | 66.7 |
| Upper | — | 2.3 | — | 20.0 |
| Education level | | | | |
| Uneducated | 3.4 | 0.6 | 2.6 | — |
| Primary school | | | | |
| Not completed | 36.7 | 18.8 | 7.9 | 16.7 |
| Completed | 26.5 | 26.9 | 18.4 | 8.3 |
| Secondary school | | | | |
| Not completed | 19.7 | 28.8 | 28.9 | 16.7 |
| Completed | 4.8 | 7.5 | 15.8 | 8.3 |
| Preparatory or technical school | 8.2 | 10.6 | 21.1 | 8.3 |
| Professional studies | 0.7 | 6.8 | 5.3 | 41.7 |
| Employment status | | | | |
| Unemployed | 39.7 | 24.7 | 15.0 | 16.7 |
| Housewife | 0.7 | 0.6 | 10.0 | — |
| Student | 4.1 | 8.2 | 15.0 | 16.7 |
| Underemployed | 42.5 | 34.8 | 32.5 | 25.0 |
| Employed, in a trade or profession | 13.0 | 31.7 | 5.0 | 41.6 |

Source: Center of Information on Drugs, Mexican Institute of Psychiatry, 1988.

One half of the solvent-inhalant users had inhaled solvents before reaching the age of 15, the youngest age of first use observed for any drug type (see table 4). A very high percentage of solvent-inhalant users had used such substances in the month prior to the last evaluation. Thus, solvent-inhalants constituted the drug type with the most current users. About one half of the users of such substances also used cannabis.

Forty-six per cent of the solvent-inhalant users were entering the participating facility or institution to seek drug abuse treatment, and 18 per cent were there to serve time for robbery. Thirty-two per cent of the users cited family disturbance as the most important drug-related problem.

Cannabis

Six per cent of the cannabis users were female and 94 per cent were male (see table 5). Their ages mainly ranged from 15 to 19; the second largest group was aged 20-24. Even though most of the cannabis users were from a lower socio-economic level, a significant percentage of them were from the middle socio-economic level. Although the level of education of about one half of the cannabis users was low, it was still higher than that of the solvent-inhalant users. The same applied to their employment status.

The largest proportion of cannabis users first used the drug when they were between 15 and 19 years of age (see table 4). Nearly 70 per cent had used cannabis during the month prior to the evaluation period. Cannabis was the drug with the highest percentage of heavy users.

Some 42 per cent of the cannabis users were registered as they were about to seek treatment and 23 per cent were about to undergo imprisonment for robbery. Thirty-three per cent reported family disturbance as the most important drug-related problem.

Cocaine

Cocaine users, like cannabis users, were 6 per cent female and 94 per cent male (see table 5). Most of them were in the 20-24 age group; thus, they were older than the other drug users, with the exception of tranquillizer users. Users from the upper socio-economic levels accounted for 20 per cent of the cocaine users, the highest percentage for any drug. Accordingly, a significant percentage of them had completed university studies and were in a profession.

Nearly 62 per cent of the cocaine users first used the drug during the period 1985-1987 (see table 4). Thus, a large proportion of them were registered by the system soon after they had begun using it. Experimental users accounted for 67 per cent of those using cocaine, the highest percentage recorded for any drug type, and only 33 per cent of the cocaine users reported having used cocaine in the month prior to the evaluation period.

In contrast with other drug users, a significant proportion of the cocaine users (25 per cent) cited health as the most important drug-related problem. Regarding the reason for entering the participating facility or institution, 31 per cent of them were seeking treatment for drug abuse and 18 per cent were seeking treatment for injuries resulting from accidents or acts of violence.

Tranquillizers

Tranquillizers constituted the drug with the highest percentage of female users (see table 5). The largest age group among the tranquillizer users was

15-19. The use of tranquilizers slowly decreased among individuals aged 20 and over. Thus, tranquilizer users, on the whole, were older than other drug users. They were also from the lowest socio-economic level. Their educational level tended to be higher than that of the other drug users, with the exception of the cocaine users.

The mean age of first use was 23, the highest for any drug. A significant proportion of the tranquilizer users first used the drug during the period 1985-1987 (see table 4).

The reason for admittance to the participating facility or institution was drug abuse treatment in 39 per cent and drug-poisoning in 20 per cent of the cases. About one third of the tranquilizer users considered family disturbances their most important drug-related problem.

Distribution of drug users according to facility or institution

The number of female users registered by health facilities or institutions was twice the number registered by criminal justice facilities or institutions. The users registered by the former were also younger, less educated, from lower socio-economic levels and of lower employment status.

Concluding remarks

IRSD made it possible for illicit drug use problem in Mexico to be diagnosed for the first time. This would not have been possible without the support and involvement of a growing number of participating facilities and institutions. This initial success has led to increased interest on the part of researchers and the authorities in further improving the epidemiological surveillance of the drug problem. Further research is needed before explicative models of drug abuse in Mexico can be developed.

IRSD must continue to operate if its reliability and validity are to be enhanced. It can be made more sophisticated if necessary.

Drug-user profiles based on variables such as drug-use patterns and socio-demographic characteristics were obtained through IRSD. It appears that most of the users are from the lower and middle socio-economic levels of the population. This interpretation should be viewed with caution, however, as it is largely individuals from those socio-economic levels who go to the facilities and institutions participating in IRSD. Users from the upper socio-economic levels tend to go to private facilities and institutions, a fact that adds to the element of secrecy surrounding drug abuse in Mexico.

Though prevalence studies may prove too expensive to be used in countries with limited resources, they may be used to supplement IRSD. Because IRSD offers a satisfactory cost-benefit ratio, such a system may prove to be especially useful to developing countries.

References

1. Secretaría de Salud, *Programa contra la farmacodependencia* (Mexico, 1985), pp. 73-75.
2. R. de la Fuente and M. E. Medina-Mora, "Las adicciones en México: II. El abuso y la dependencia de fármacos psicoactivos", *Salud Mental*, vol. 10, No. 2 (1987), pp. 14-21.
3. M. E. Medina-Mora, "Prevalencia del consumo de drogas en algunas ciudades de la República Mexicana", *Cuadernos Científicos CEMESAM*, vol. 11, 1979, pp. 77-86.
4. Centro de Información y Documentación en Farmacodependencia, "Grupo interinstitucional para el desarrollo del Sistema de Información en Drogas; reporte 1: septiembre 1986", unpublished report.
5. C. Orozco, A. Ortiz and M. Romano, "La obtención de información sobre farmacodependencia: problemas y alternativas", *Psiquiatría*, vol. 4, No. 1 (1988), pp. 1-8.
6. A. Ortiz and others, "Desarrollo del sistema de reporte de información en farmacodependencia y tendencias del consumo en el área metropolitana", *Salud Mental*, forthcoming.
7. I. Rootman and P. H. Hughes, *Drug-abuse Reporting Systems*, WHO Offset Publication No. 55 (Geneva, World Health Organization, 1980).
8. Addiction Research Foundation, *Statistics on Alcohol and Drug Abuse in Canada and Other Countries: vol. II. Statistics on Drug Use* (Toronto, Addiction Research Foundation, 1984).
9. A. Roca and J. Antó, *Sistema Estatal de Información sobre Toxicomanías* (Barcelona, Ministerio de Sanidad y Consumo, 1986).
10. Narcotics Division, *Central Registry of Drug Abuse: Seventeenth Report* (Hong Kong, 1986).
11. National Institute on Drug Abuse, *Data from the Drug Abuse Warning Network (DAWN)*, Statistical Series, No. 6 (Rockville, Maryland, United States Department of Health and Human Services, 1987).
12. Office of the Narcotics Control Board, *Statistical Report: Drug Dependence Information System* (Thailand, 1983).
13. M. E. Castro and others, "Epidemiología del uso de drogas en la población estudiantil, tendencias en los últimos 10 años", *Salud Mental*, vol. 9, No. 4 (1986), pp. 80-86.
14. Centro de Información y Documentación en Farmacodependencia, "Grupo interinstitucional para el desarrollo del Sistema de Información en Drogas; reporte: junio 1987", unpublished report.
15. Centro de Información y Documentación en Farmacodependencia, "Grupo interinstitucional para el desarrollo del Sistema de Información en Drogas; reporte 3: noviembre 1987", unpublished report.
16. M. E. Medina-Mora and others, "A methodology for intensive case-finding and monitoring of drug use in a Mexican community", *Bulletin on Narcotics* (United Nations publication), vol. 32, No. 2 (1980), pp. 17-26.
17. M. E. Medina-Mora, A. Ortiz, C. Caudillo and S. López, "Inhalación deliberada de disolventes en un grupo de menores mexicanos", *Salud Mental*, vol. 5, No. 1 (1982), pp. 77-86.