

# The NHSDA Report

August 23, 2002

## Marijuana Use and Drug Dependence

### In Brief

- Over 1 million youths aged 12 to 17 and half a million young adults aged 18 to 25 used marijuana for the first time in 1999
- In 2000, the highest rate of past month marijuana use was among 19 year olds
- Adult dependence on illicit drugs was more likely among individuals who first used marijuana at age 14 or younger than among those who first used marijuana after age 14

The National Household Survey on Drug Abuse (NHSDA) asks respondents to report on their marijuana use, as well as symptoms of dependence on illicit drugs. Illicit drugs include marijuana/hashish, cocaine (including crack), inhalants, hallucinogens, heroin, or any prescription-type drugs used nonmedically. Current marijuana use is defined as use within the past 30 days. In the NHSDA, dependence is defined using criteria in the American Psychiatric Association's *Diagnostic and Statistical Manual of Mental Disorders* (DSM-IV), which includes such symptoms as increased tolerance, feelings of withdrawal without the drug, and interference with everyday life in the past year (Table 1).<sup>1</sup>

### New Marijuana Users

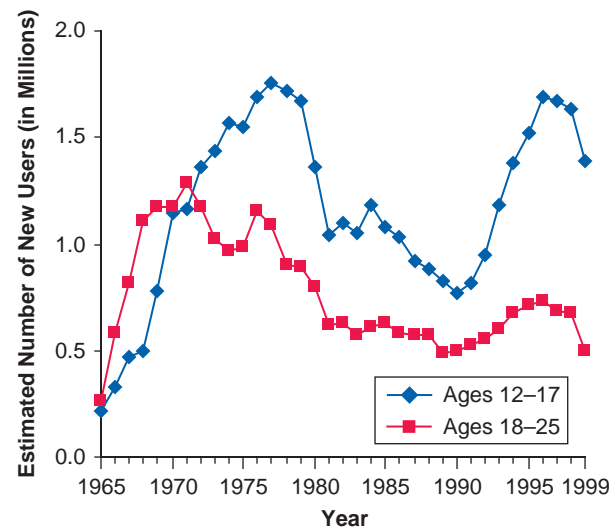
According to combined data on age at first use from the 1999 and 2000 NHSDAs, the numbers of new marijuana users among youths aged 12 to 17 increased markedly during the 1990s. The number of new marijuana users among youths in 1990 was fewer than 800,000 but increased to nearly 1.7 million in 1996, comparable to record high numbers last seen in the late 1970s (Figure 1). In 1999,<sup>2</sup> nearly 1.4 million youths aged 12 to 17 initiated marijuana use compared with 1.6 million in 1998.

**Table 1. DSM-IV Diagnosis of Substance Dependence**

*A definite diagnosis of dependence is made when any three of A and B are "yes."*

- A. Has the individual experienced the following?
1. Tolerance—discovering less effect with same amount (needing more to become intoxicated)
  2. Withdrawal (characteristic withdrawal associated with type of drug)
  3. Using more or for longer periods than intended
  4. Desire to or unsuccessful efforts to cut down or control substance use
  5. Considerable time spent in obtaining or using the substance or recovering from its effects
  6. Important social, work, or recreational activities given up or reduced because of use
  7. Continued use despite knowledge of problems caused by or aggravated by use
- B. Have these positive items been present during the same 12-month period?

**Figure 1. Estimated Numbers (in Millions) of Persons Aged 12 to 25 Who First Used Marijuana During the Years from 1965 to 1999**



The numbers of new marijuana users among young adults aged 18 to 25 were lower than among youths for most years. The numbers of young adults initiating marijuana use during the late 1990s ranged from a high of 736,000 in 1996 to a low of 496,000 in 1999, which in turn was a decline from 679,000 new users in 1998. The 1999 estimate of young adults who initiated marijuana use was one of the lowest since the mid-1960's.

### Prevalence of Marijuana Use

An estimated 1 in 20 (almost 11 million persons) in the United States used marijuana in the past month in 2000. Use increased for each age beginning at age 12 and peaking at age 19. Among 12 year olds, it was 1 percent (22,000 current users); however, among 19 year olds, it was 18 percent (684,000 current users)

(Figure 2). Among 20 year olds, it was 17 percent compared with 8 percent among 25 year olds. Prevalence continued to drop with age, declining to 1 percent for persons aged 50 to 54.

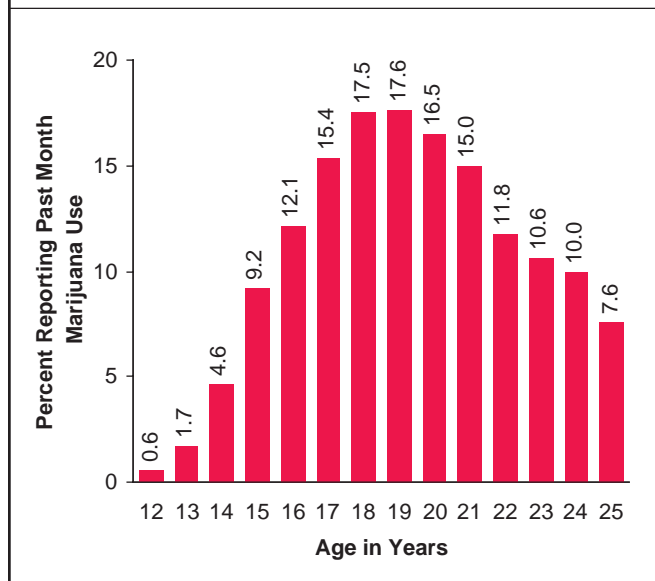
Four million young adults aged 18 to 25 (14 percent) in 2000 were current users of marijuana. Males (17 percent) were more likely to be current users than females (11 percent), and whites (15 percent) and blacks (13 percent) were more likely to be current users than Hispanics (8 percent). Unemployed young adults (22 percent) were considerably more likely to be current users than full-time (13 percent) or part-time employed (15 percent) persons.

### Early Use of Marijuana Linked to Dependence in Adults

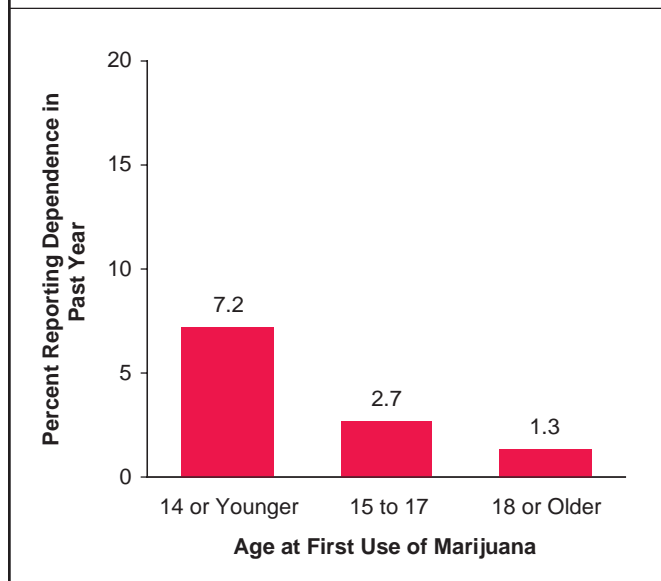
Earlier use of marijuana is associated with illicit drug dependence

during the adult years. Seven percent of adults aged 18 or older who first used marijuana at age 14 or younger (close to 1 million persons) were dependent on illicit drugs in 2000, over twice the rate among those who first used marijuana at ages 15 to 17 (3 percent) and over 5 times the rate among those who first used it at age 18 or older (1 percent) (Figure 3). For young adults aged 18 to 25, this pattern of past year illicit drug dependence was more pronounced—15 percent who initiated marijuana use at age 14 or younger were dependent compared with 6 percent who initiated use between the ages of 15 and 17 and 2 percent who initiated after the age of 17. There were no gender differences in dependence among young adults reporting first use of marijuana at age 14 or younger (7 percent for both males and females). Black (10 percent) and Hispanic (9 percent) young adults who started using marijuana at age 14 or

**Figure 2. Percentages of Persons Aged 12 to 25 Reporting Past Month Marijuana Use, by Age: 2000**



**Figure 3. Percentages of Adults Aged 18 or Older Reporting Past Year Illicit Drug Dependence, by Age First Used Marijuana: 2000**



younger were significantly more likely than whites (7 percent) to be dependent on illicit drugs. Similarly, young adults with less than a high school education who initiated marijuana use before 14 years of age were more likely to be dependent on illicit drugs (10 percent) than those with more education (7 percent for both high school graduates and those with some college education, 5 percent of college graduates).

**End Notes**

1. American Psychiatric Association. (1994). *Diagnostic and statistical manual of mental disorders* (4th ed.). Washington, DC: Author.
2. Because estimates of new data are based on retrospective reports, the most recent year available for 2000 data is 1999.

**Table and Figure Notes**

Table 1 – Source: American Psychiatric Association. (1994). *Diagnostic and statistical manual of mental disorders* (4th ed.). Washington, DC: Author.

Figure 1 – Note: The number of persons who first used marijuana in 1999 was estimated using aggregated 1999 and 2000 data.

Source: SAMHSA, 1999 and 2000 National Household Surveys on Drug Abuse (NHSDAs).

Figure 2 – Source: SAMHSA, 2000 National Household Survey on Drug Abuse (NHSDA).

Figure 3 – Note: “Any illicit drug” refers to marijuana/hashish, cocaine (including crack), inhalants, hallucinogens, heroin, or any prescription-type drugs used nonmedically.

Note: Dependence is based on the definition found in the 4<sup>th</sup> ed. of the *Diagnostic and Statistical Manual of Mental Disorders* (DSM-IV).

Source: SAMHSA, 2000 National Household Survey on Drug Abuse (NHSDA).

The National Household Survey on Drug Abuse (NHSDA) is an annual survey sponsored by the Substance Abuse and Mental Health Services Administration (SAMHSA). The 1999 and 2000 data are based on information obtained from nearly 142,000 persons aged 12 or older (about 70,000 each year). The survey collects data by administering questionnaires to a representative sample of the population through face-to-face interviews at their place of residence.

The NHSDA Report is prepared by the Office of Applied Studies (OAS), SAMHSA, and by RTI in Research Triangle Park, North Carolina.

Information and data for this issue are based on the following publications and statistics:

Substance Abuse and Mental Health Services Administration. (2001). *Summary of findings from the 2000 National Household Survey on Drug*

*Abuse* (NHSDA Series: H-13, DHHS Publication No. SMA 01-3549). Rockville, MD: Author.

Substance Abuse and Mental Health Services Administration. (2000). *Summary of findings from the 1999 National Household Survey on Drug Abuse* (NHSDA Series: H-12, DHHS Publication No. SMA 00-3466). Rockville, MD: Author.

Also available on-line at <http://www.DrugAbuseStatistics.samhsa.gov>.

Additional tables:

1.20A; 1.20B; 1.33A; 1.33B from [http://www.samhsa.gov/oas/nhsda/2kdetailedtabs/Vol\\_1\\_Part\\_1/V1P1.htm](http://www.samhsa.gov/oas/nhsda/2kdetailedtabs/Vol_1_Part_1/V1P1.htm) and

4.1A from [http://www.samhsa.gov/oas/nhsda/2kdetailedtabs/Vol\\_1\\_Part\\_3/V1P3a.htm](http://www.samhsa.gov/oas/nhsda/2kdetailedtabs/Vol_1_Part_3/V1P3a.htm).

Additional tables available upon request.

