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ABSTRACT

To investigate incidence and frequency of use of 8 drugs ranging from marijuana to LSD to heroin, 2 anonymous polls were administered to 2,141 incoming freshmen and returning students at the University of Maryland during the summer and fall of 1971. Students' reasons for using and not using drugs, students' attitudes toward legalizing, using, and selling drugs, as well as the University providing drug related services were also studied. Results indicate that less than half (47%) of the students have used any of the drugs and that evidence of heroin use is minimal (1%). Students use drugs and marijuana for the same reasons (to get high, feel good, and experience things more vividly). Students refrain from using marijuana because of either no desire or its illegality, but refrain from using drugs because of no desire and potentially harmful effects, both physical and psychological. Students' attitudes indicated strong support for increasing drug-related services at the University, and showed a greater distaste for selling drugs than using them and a greater distaste for hard drugs than for marijuana. (Author/HS)

# COUNSELING CENTER

Office of Vice Chancellor for Student Affairs

UNIVERSITY OF MARYLAND

College Park, Maryland



## UNIVERSITY STUDENT ATTITUDES AND BEHAVIOR TOWARD DRUGS

Joseph L. Horowitz & William E. Sedlacek

Research Report # 3-72

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## Summary

Two anonymous polls were administered to both incoming freshmen and returning students of the University of Maryland, June - September, 1971 (N=2141). The polls were designed to investigate incidence and frequency of use for eight drugs ranging from marijuana to LSD to heroin. Students' reasons for using and not using drugs and students' attitudes toward legalizing, using and selling drugs and the University providing drug-related services were also studied.

Results indicated that less than half (47%) of the students have used any of the drugs and that evidence of heroin use is minimal (1%). Students use "drugs" and "marijuana" for the same reasons (to get high, feel good, and experience things more vividly). Students refrain from using "marijuana" because of either no desire or its illegality, but refrain from using "drugs" because of no desire and potentially harmful effects, both physical and psychological. Men use drugs more than do women; upperclassmen more than do freshmen; commuters who do NOT live with a relative more than do dormitory residents or those commuters living with a relative.

Students' attitudes indicated strong support for increasing drug-related services at the University, and showed a harder line on selling drugs than using drugs, and a harder line on "other drugs" than "marijuana." Multiple regression equations computed to predict use of drugs revealed that an interest in attending a drug education program and feeling the University should not turn in students selling drugs other than marijuana were most predictive of drug use. Factor analyses revealed three orthogonal factors: turning in users and sellers, drug use, and drug services.

Implications for future drug-related research and suggestions for college administrators were also discussed.

The emergence in the mid-1960's of both the "hippie flower children" of San Francisco's Haight-Ashbury district and of psychedelic, acid-rock music indicated to the American public that drug use was no longer confined to inner city ghettos. The social phenomenon of drug use, now embracing all segments of our society, has become a part of the college scene, and is currently diffusing downward to secondary, junior high, and even elementary schools (Berg, 1971). Finestone (1957) asserts that behavioral scientists' first efforts toward researching drug use centered upon studying the drug use of "marginal" individuals, including ghetto residents. However, once it became clear that drug use was, in fact, a part of middle class youth's lives, national concern developed. Such concern has manifested itself in a number of ways, including anti-drug advertisements in the media, the emergence of a preponderance of drug conferences, increased funding for law enforcement, and increased funding for drug-related research. Such research has covered both treatment and prevention of problems associated with drug use, but investigations into treatment and prevention, by their very nature, necessitate an understanding of the etiology of drug use.

Some research has been generated concerning why students use drugs. Survey techniques have revealed such reasons as escape from reality, tension, worry, and rebellion against both parents and society (Dickerson, 1969), as well as "bored, in pain, frustrated, unable to enjoy, alienated" (*Time*, 1969) as explanations why students use drugs. On the other hand, an impulse to feel good (*Time*, 1969), get high, and experience things more vividly (McKenzie, 1970), and "pleasure, kicks, enjoyment" (Sievert, 1972) have also been reported. More general hypotheses, based more on opinion than empirical evidence, state that drugs are used for religious reasons (Alpert, 1968; Blum, 1968; Nowlis, 1969), as a response to the college environment (Keniston, 1968; Forrer, 1970), as a response to the sociopolitical climate (Keniston, 1968), and out of exploration or risk-taking

(Alpert, 1968; Nowlis, 1969). It seems that either students use drugs for a wide variety of reasons, or that past findings are inconclusive. At any rate, further investigations of why students use drugs would seem to be in order.

A glance at current research efforts reveals an additional direction of drug research. A need to understand the drug phenomenon has prompted efforts to investigate the extent of "non-medical use of dangerous drugs in the U.S." (Berg, 1971, p.1). Numerous efforts have centered upon the incidence of drug use (Office of Mental Health Planning, 1969), with the primary mode of investigation being either survey or interview techniques. A number of these studies have sampled either college students or "hippies" who frequented such areas as Haight-Asbury (Allen and West, 1968; Suchman, 1968; Keniston, 1968-69; Blum et al., 1969; Berg, 1970; McKenzie, 1970; *Playboy*, 1970; *Playboy*, 1971). Other studies have concentrated upon the use of a particular type of drug, e.g, LSD, marijuana, heroin, etc., and attempted to examine the users' motivations (Schacter, 1968; Blum, 1969; Smart and Fejer, 1969; McKenzie, 1970; U.S. Department of Health, Education and Welfare, 1971).

Studies employing survey techniques suffer from two limitations that restrict their utility to lead to generalizations. Not only are surveys at a given campus or area non-representative, in terms of their own samples, but the particular campus or area is usually not representative of other campuses or areas (Berg, 1971). This results in tremendous difficulty in attempting to derive national figures on drug use, let alone figures on college students only. Berg (1971) highlights this problem when she points out that within a given year, drug use rates among college and high school populations show ranges of variations for all drugs. These studies of drug use seem to lead to the conclusion that the rates of use for different drugs are drug specific. National averages for the

use of marijuana and LSD have been estimated at 20% and 5%, respectively (Alsever, 1968). There are clear differences between the extent of use of marijuana, amphetamines, barbiturates, LSD, cocaine, and heroin (Berg, 1971, 1970; *Playboy*, 1971). Additionally, research indicates that drug use is increasing. Edison (1970) reports that the number of students starting drug use increased rapidly between 1959 and 1968. McKenzie (1970) and *Playboy* (1971) also reported marked increases in the extent of use within periods of less than three years. Finally, Berg (1971) cites rising rates of use for marijuana, LSD, amphetamines, barbiturates, and opiates, among both college and non-college youth. All of this would seem to indicate that: much research has been conducted on the etiology of drug use; drug use among students is increasing; and students use different drugs to varying degrees.

The latter point, differential use, leads to an interesting hypothesis. If students use Drug X much less than they use Drug Y, could it be that their reasons for using the drugs may differ? The literature has little to offer here, indicating that the matter needs further study.

The laws pertaining to drug abuse (any sale, distribution, consumption, manufacture, or transportation of illegal drugs) are beginning to reflect a differentiation between users and sellers, whereby penalties for possession are becoming less severe than those for selling. Presumably, these laws reflect differential attitudes toward using and selling. Also, penalties for marijuana possession are lessening, again indicating differential attitudes toward marijuana and other drugs. Not only is there evidence indicating an increasing sentiment toward legalizing marijuana (McKenzie, 1970; American Council on Education, 1971; Creager, 1971; *Playboy*, 1971), but at least two national lobbying organizations, NORMAL (National Organization for the Reform of Marijuana Laws) and LEMAR (Legalization of Marijuana) have been exerting influence to obtain

national legislation legalizing marijuana. Also, in a report released March 22, 1972, The National Commission on Marijuana and Drug Abuse recommended discouraging the use of marijuana but legalizing its possession for personal use.

Finally, there is the issue of higher education's response to this growing drug use. American colleges and universities are developing drug policy statements, instituting drug education programs, and expanding their counseling services to include drug counseling. These responses to the campus drug situation may take many forms, but it seems reasonable to assume that the course of action that a particular institution takes should reflect the needs of its students, as well as the extent and types of drug situations at the institution.

Most drug research has emphasized extent of use; that is, how many people (students) have used Drug X. As Berg (1971, p.9) points out, "Statistics on the extent and prevalence of the nonmedical use of dangerous drugs serve as indicators of misuse and abuse of drugs, but by themselves do not define the problem." Apparently, movement in the direction of working with drug attitudes is underway, perhaps in recognition of the fact that drug use is, indeed, a complex phenomenon. The Southern Regional Education Board, in cooperation with 14 states, is currently developing a drug education program whose focus is attitudinal change, rather than the mere dissemination of information (*Journal of College Student Personnel*, 1972).

The purpose of this study was to investigate both the behavior and attitudes toward drugs at the College Park Campus of the University of Maryland. Both the incidence and frequency of use of a number of drugs, ranging from marijuana to heroin, were investigated. For purposes of this study, incidence was defined as the percentage of people who reported ever having used a specific drug; frequency was defined as the number of times the respondent had ever used the specific drug. Additionally, reasons for refraining from use, ceasing use and maintaining use of drugs were explored. Finally, attitudes toward legalization of drugs,



users, sellers, and drug-related student services were investigated. The attempt was to go beyond a mere description of incidence, frequency and attitudes, by searching for relationships between attitudes and behavior.

#### Method

*Instruments:* Two anonymous polls were developed to assess student attitudes and behavior related to drugs. The only differences between the two polls were that one asked reasons for use, nonuse, or cessation of use for "marijuana" (Poll A), while the other asked reasons for use, nonuse, or cessation of use for "drugs" (Poll B). Questions on the extent of usage covered not only marijuana, but seven other drugs, ranging from hashish to heroin. Additionally, for each drug, students were asked whether they had used the drug, and if so, how often. Typically anyone who has ever used a given drug is classified as a user; few investigations deal with the question of frequency of use. Further, few studies have treated use of hashish as a separate category from marijuana (U.S. Department of Health, Education and Welfare, 1971). Although the polls in the current study were anonymous, students were asked to indicate their sex, class and place of residence (dormitory, apartment, etc.)

*Subjects:* The polls were administered to incoming freshmen and returning students at the University of Maryland, College Park, during summer and fall registration, 1971. The total sample consisted of 2,288 students, (1147 incoming freshmen and 1141 returning students ) who had an approximately equal chance of being asked to complete either a poll on drugs or one of five other topics.

*Procedure:* Due to incomplete responses, data on 147 students were not used, making the final usable N 2,141; 1,064 incoming freshmen and 1,077 upperclassmen. The sample consisted of 1060 men (50%) and 980 women (46%); 1166 freshmen (54%), 408 sophomores (19%), 417 juniors (19%) and 131 seniors (6%); 808 commuting, living with a relative (38%); 529 commuting, not living with a relative (25%) and 754

living in a dormitory, fraternity or sorority (35%). Neither the N's nor the percentages sum perfectly due to incomplete data. The sample appears representative of the campus except for the small number of seniors, most of whom pre-registered, and the relatively large number of freshmen.

*Data Analyses:* Data were analyzed by frequency and percent response by sex, class and residence. Comparisons of attitudes, reasons for use and non-use of "drugs" and "marijuana" by sex, class and residence were made, using  $\chi^2$  and F. Frequencies of use of each drug were compared by sex, class, residence and form of the poll ("drugs" vs. "marijuana") using F. Additionally, a three way unweighted means analysis of variance with frequency of marijuana use as the dependent variable and sex, class and residence as main effects was conducted. Cross-validated step-wise multiple regression equations were generated for each drug with frequency of use as the criterion and sex, class and the 15 attitude items as predictors.

Finally, sex, class, frequency of use of each drug, and all attitude items were intercorrelated and factor analyzed, using the principal components method with squared multiple correlations as communality estimates, and varimax rotation of all factors with eigenvalues greater than 1.

## Results

### *Incidence of Use:*

Table 1 presents the incidence of use for the eight drugs for the sample compared to the results of a national survey of just under 3,000 students from 60 college campuses (*Playboy*, 1971, p. 212). The table indicates that the incidence of drug use at the University of Maryland is less than that of students across the nation. Fewer than one-half of the students report ever having tried any drug. However, Goode (1970, p. 315) cautions, "The potential interviewee (respondent) in a complete stranger situation will normally fear detection by

law-enforcement agencies, and will be unwilling to be interviewed (to respond) in the first place, or, if willing, would be evasive and even dishonest." Thus, since students are being asked to admit to committing a crime, it seems reasonable to hypothesize that the incidence of drug use may, in fact, be higher than the respondents indicate. However, these results indicate that although opiates and narcotics (heroin, cocaine) are being used, their incidence appears relatively low.

Table 2 presents the incidence of use for the 8 drugs for the sample by sex and class and indicates that men used drugs more than did women and use increases with class. The seniors did not fit this pattern, but this could be due to the fact that the senior sample may not have been representative.

Tables 1 and 2 show that marijuana and hashish are used by the largest number of people, followed by the hallucinogens (mescaline, LSD, DMT) and the opiates (cocaine, heroin).

#### *Frequency of Use:*

Turning from incidence to frequency of use, a more striking example of a crude dichotomy between marijuana/hashish and other drugs begins to appear. For each of the eight drugs, students were asked to indicate how frequently they used the drug (responses ranged from "never" to "often" (more than twice/week). The modal frequencies for marijuana and hashish users were "a few times" and "often," while the modal responses for users of the other six drugs were "a few times" and "once." Thus, not only were marijuana and hashish the drugs with the greatest incidence, but they were also the drugs with the greatest frequency of use. The percentage of users who report using a given drug at least three times in their experience were: marijuana 39%; hashish 28%; speed 12%; mescaline 8%; LSD 7%; DMT 2%; Cocaine 2%; Heroin 1%.

Table 3 shows that Residence was the only significant effect ( $p < .05$ ) in frequency of marijuana use. Neither Sex, Class, nor any of the interactions were significant. It would appear that where a student lives is related to how often he will use marijuana. The most frequent use occurred with students who commute but do not live with a relative, followed by students living in either dormitories, fraternities, or sororities, with students who commute and live with a relative using marijuana least frequently. Table 4 shows that the best predictors of amount of use are fairly specific to each drug although feeling that the University should not turn in students selling drugs other than marijuana (item 21) was a predictor of use of marijuana, hashish, speed, LSD and cocaine. Also, interest in attending a drug education program (item 14) was predictive of use of LSD, DMT, cocaine and heroin. Thus, those using hallucinogens or opiates were most interested in drug education. Interestingly, those who would themselves turn in marijuana sellers (item 12) were more likely to be marijuana, hashish, or cocaine users, but less likely to be speed or mescaline users. Being an upperclassman (item 1) carried some weight in predicting speed, mescaline and heroin use. Being a male (item 2) was somewhat predictive of LSD, DMT, and cocaine use, while being a female was predictive of the use of speed. The reader is reminded that while the R's have been cross validated, the N's vary considerably in size. Also sex was included in the regression analyses as an artificial or dummy variable.

*Reasons for Use and Non-Use:*

Investigating the reasons why students either refrain from using drugs or why they no longer use drugs presented the opportunity to discern any differences between the referents "drugs" and "marijuana." On Poll A, Question 6 reads, "I have not used marijuana, or I do not intend to do so again for the following reasons:", while Question 6 of Poll B reads, "I have not used drugs

or I do not intend to do so again for the following reasons."  $\chi^2$  analyses showed no differences between respondents to polls A and B on sex, class or residence, which was expected due to random assignment to forms. Thus, any differences between the two polls may be assumed to be due to differential connotations of the words "drugs" and "marijuana." A similar differentiation is present on polls A and B for Question 7: "I use marijuana (drugs) for the following reason(s)."

Tables 5 and 6 present the results of questions 6 and 7 with the reasons presented in rank-order. Looking at nonuse (Table 5) the most striking difference between the two polls is that "illegality" was the second most prevalent reason for nonuse of "marijuana," but was only the fifth most prevalent reason for nonuse of "drugs." The most prevalent reason in both polls was "no desire to experience its effects," while "difficulty in obtaining the substance" was the least prevalent response. The reasons for nonuse of "drugs" (poll B) focused more on the potentiality of harmful effects, either psychological or physical, than did the reasons for nonuse of "marijuana" (poll A). A  $\chi^2$  between poll A and B on this question revealed a significant difference ( $p < .05$ ) between reasons for nonuse of marijuana and reasons for nonuse of drugs. Additionally, incoming freshmen reported significantly different reasons for nonuse from the reasons of returning students ( $\chi^2, p < .05$ ). Freshmen reported potential disapproval from parents or friends and observations of effects in others more often than did upperclassmen, but upperclassmen report illegality as a reason for nonuse more often than do freshmen. Finally, the reasons for nonuse of men differed significantly from the reasons of women ( $\chi^2, p < .05$ ). Men reported illegality and observation of harmful physical effects as reasons for nonuse more often than did women. Thus, reasons for nonuse show differences between sexes, class (freshmen vs. returning students), and between "drugs" and "marijuana."

Two Hundred and Eighty-one (281) users were classified as ex-users since they indicated they did not intend to use drugs or marijuana again. Since there were no differences between the total sample and ex-users' reasons for non use, it would seem that users become ex-users for essentially the same reasons that people never become users.

Table 6 shows findings that support McKenzie (1970) and Sievert (1972), namely that students use "drugs" (or "marijuana") primarily to "get high, feel good" and "to experience things more vividly." A  $\chi^2$  between polls A and B on reasons for use (Question 7) proved *not* significant at the .05 level. Thus, it appears that while students differentiate between "marijuana" and "drugs" in terms of reasons for *nonuse*, they do not differentiate between the two in terms of reasons for *use*. Other prevalent reasons for using "marijuana" ("drugs") included relieving anxiety or boredom and making a fine feeling or good mood last longer. It appears that a second primary motivation for using drugs is the desire to calm down or to make experiences more enjoyable. Although, overall, there was no significant difference between polls A and B in terms of reasons for use, incoming freshmen were again found to report significantly different reasons than did returning students ( $\chi^2$ ,  $p < .05$ ). Returning students used drugs to relieve boredom or anxiety more than did freshmen, but freshmen reported making a good mood last longer, and enjoying doing something illegal as reasons for use more often than did returning students.

#### *Attitudes:*

Table 7 presents means and standard deviations for each of the 15 attitudinal items on the questionnaire. Students most strongly agreed that a drug counseling service should be provided and funded by student government (items 15 and 16) although they also agreed that they would go to the University Counseling Center if they felt a need for drug counseling (item 22). Additionally, 50% of the students felt

they would attend a drug education program on campus (item 14). Students also favored legalizing marijuana (item 8). A majority (54%) of the students favored legalizing marijuana while only 5% favored legalizing all drugs (item 9). The figure of 54% may be compared to the views of freshmen at public universities (44%, American Council on Education, 1971), those of graduate students (39%, Creager, 1971), those of a national sample of college students (46%, *Playboy*, 1970) and those of students at the University of Maryland (48%, McKenzie, 1970). Thus, not only do the students at the University of Maryland favor legalization of marijuana (54% exceeds the 47% incidence of marijuana use figure), but they also make a clear differentiation between "marijuana" and "all drugs," much like their responses to reasons for nonuse.

Responses to questions on sellers and users (10-13 and 18-21) revealed further differentiation by the student body along three dimensions: using vs. selling; marijuana vs. other drugs; and self vs. University. Results indicated that students take a "harder line" on other drugs than on marijuana, that they take a harder line on selling than using, and that they are more likely to agree that the University should turn someone in than to agree that they, themselves, would turn someone in.

In an attempt to identify group differences in attitudes, a number of different analyses of variance were performed.

*Men vs. Women:*

Five of the questionnaire items (9,14,15,16,17) showed significance ( $F, p < .05$ ). The direction, as well as the content, of these differences are important to note. Although women are more opposed to legalizing all drugs, they are more in favor of a drug education program, a drug counseling service, of the Student Government Association (SGA) funding such a service, and have more

sympathy for "people on drugs."

*Incoming Freshmen vs. Returning Students:*

Significant differences between these two groups were found ( $F, p < .05$ ) on eight of the 15 questions. Freshmen were less in favor of legalizing marijuana or all drugs and more in favor of drug counseling and drug education programs as well as spending student government funds for these purposes than were returning students. Freshmen were also more in favor of the University turning in drug and marijuana sellers.

*Residence:*

Significant differences among residential groups were found ( $F, p < .05$ ) on 10 of the 15 questions. The four residential groups were: commute, living with relatives; commute, not living with relatives; fraternity/sorority house; and dormitory. Generally commuters living with a relative were more in favor of turning in drug or marijuana sellers themselves as well as having the University turn in both types of sellers. Dormitory residents felt more strongly that the University should turn in users and sellers and were more opposed to legalizing all drugs than were other students.

*Factor Analysis:*

Table 8 shows the results of a factor analysis done on selected questionnaire items. The factors accounting for 100% of the common variance were labeled: I Turning in Users and Sellers, II Drug Use, and III Drug Services. Since they are orthogonal factors it appears useful to think of these as separate dimensions when conducting drug-related research.



### Discussion

The incidence of drug use at the University of Maryland has become an increasing source of concern to members of the campus community. Since September, 1971: The Office of Residential Life has published a booklet entitled, "Diagnosis and Emergency Treatment in Reference to Drug Abuse;" the Student Affairs staff has had two professional staff development meetings on the topic of drugs; the Vice Chancellor for Student Affairs has issued several campus-wide statements on drug use; and plans for a campus drug clinic have unfolded but are currently stalled. All of this activity would seem to indicate much concern over the drug "problem."

The drug "problem" at the University of Maryland may well not be the monumental crisis some have made it out to be. Although incidence of drug use is present for all 8 drugs surveyed, incidence of the addicting opiates (cocaine, heroin) is quite low, and overall incidence may well be below national figures of college student drug use. However, the reader is cautioned against making anything more than tentative conclusions based on these data, due to the following limitations: (1) All students surveyed were asked to admit committing a crime, so that actual incidence may be higher than reported here. (2) The sample was biased in that it had a disproportionately large number of freshmen and a small number of seniors. (3) Reasons for use and nonuse are probably not as simplified as a few word phrase and the students may not understand why they do or do not use drugs. Also students may not give honest responses. The personality and psychosocial dynamics involved in drug use are important to consider. For instance, Knecht, Edwards, Gunderson and Cundick (1971) found social conformity negatively related to frequency of marijuana use among 135 college students. (4) The incidence of drug use is a thoroughly dynamic phenomenon; figures that were reasonably accurate in 1971 may have little or no relationship to current

figures of incidence. (5) Large samples and multiple statistical tests increase chances for Type I errors, although the results were quite internally consistent.

With these limitations in mind, it is appropriate to attempt to draw inferences from the data. Marijuana and hashish are not only the drugs with the highest incidence, but also the highest frequency. Further, of drug-users, 55% have used only marijuana and/or hashish. Men are more likely to use drugs than women; upperclassmen more likely than freshmen; commuters who *do not* live with a relative are more likely to use drugs than are dormitory or fraternity/sorority residents who, in turn, are more likely to use drugs than students who commute and *do* live with a relative.

Incidence of drug use at Maryland, as well as support for legalization of marijuana continues to increase. Mc Kenzie's (1970) work provides a helpful baseline:

|                        | 1967 | 1968 | 1969 | 1971 |
|------------------------|------|------|------|------|
| Incidence of marijuana | 15%  | 24%  | 36%  | 47%  |
| Legalize marijuana     |      | 38%  | 48%  | 54%  |

The incidence of drug use among incoming freshmen (marijuana 41%) may seem alarmingly high, until, again, data put it in perspective. A 1969 study of Montgomery County, Maryland senior high school students indicated that approximately 23% of the senior class had tried marijuana and 2% heroin (Berg, 1970). If there is a drug "problem" it is certainly not indigenous to the college campus.

Goode (1970) points out that marijuana smokers are capable of making, and, in fact, do make clearcut distinctions as to "dangers" among various drugs. The students in the present survey also indicated that they make distinctions as measured by differential attitudes toward legalization, toward turning in other

drug vs. marijuana users and sellers, and by virtue of the incidence levels of the more "dangerous" drugs.

But more than that, students at the University of Maryland, both drug users and nonusers, strongly favor increasing the availability of drug-related services such as counseling and drug education. The more one favored drug education, the more likely he was to use drugs frequently. The message should be clear; well conducted drug education programs would be likely to attract drug users.

The multiple regression equations could prove useful to any university administrator or counselor who is attempting to work with and better understand student drug users. Indeed, it is hoped that the data are used positively rather than to identify and harrass individual students. As noted before, none of the data in this study are accurate enough to consider such negative use as practical. But as an indication of general trends and tendencies among drug users, the information should be most valuable.

More work needs be done relating attitudes on such topics as sexual and political behavior to drug use. More in-depth probing of reasons for use and nonuse should prove especially useful. The three factors found via factor analysis, turning in users and sellers, drug use, and drug services, need to be validated on other samples. And finally, more research needs to be done within the Maryland geographical community itself, for as Blum et al. (1969) and Barter et al. (1970) discovered, there can be considerable variation in drug use across institutions even when they all lie in the same metropolitan area.

There can be no denying the fact that students at the University of Maryland use drugs of all types. However, the key points to remember are: all students, users and nonusers alike, favor increasing the availability of drug-related services; and students differentiate between marijuana/hashish and other drugs, both behaviorally and attitudinally. That students report using drugs to

feel good, get high, and relieve boredom and anxiety may indicate that their environment does not respond to their needs, in a sense necessitating their turning to drugs.

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Table 1.

## Incidence of Use for Eight Drugs\*

|                  | <u>Marijuana</u> | <u>Hashish</u>    | <u>Speed<br/>(Amphetamines)</u> | <u>Mescaline</u> | <u>LSD</u> | <u>DMT</u>        | <u>Cocaine</u> | <u>Heroin</u> |
|------------------|------------------|-------------------|---------------------------------|------------------|------------|-------------------|----------------|---------------|
| Current Study    | 47%              | 35%               | 18%                             | 13%              | 10%        | 5%                | 4%             | 1%            |
| <i>Playboy</i> † | 62%              | not re-<br>ported | 30%                             | 18%              | 13%        | not re-<br>ported | 7%             | 3%            |

\* Figures rounded to the nearest whole percent. Incidence = have ever used.

† *Playboy*, 1971, p.212.

Table 2.

## Incidence of Use For Eight Drugs By Sex and Class\*

|            | <u>Marijuana(%)</u> | <u>Hashish(%)</u> | <u>Speed(%)</u> | <u>Mescaline(%)</u> | <u>LSD(%)</u> | <u>DMT(%)</u> | <u>Cocaine(%)</u> | <u>Heroin(%)</u> |
|------------|---------------------|-------------------|-----------------|---------------------|---------------|---------------|-------------------|------------------|
| Men        | 53                  | 34                | 18              | 14                  | 11            | 5             | 5                 | 2                |
| Women      | 42                  | 33                | 17              | 11                  | 8             | 4             | 3                 | 1                |
| Freshmen   | 41                  | 30                | 13              | 10                  | 8             | 4             | 3                 | 1                |
| Sophomores | 54                  | 40                | 23              | 17                  | 12            | 6             | 6                 | 2                |
| Juniors    | 56                  | 43                | 23              | 17                  | 13            | 7             | 5                 | 1                |
| Seniors    | 53                  | 39                | 28              | 15                  | 10            | 5             | 5                 | 1                |

\* Incidence = have ever used

Table 3.

## Summary Table for Unweighted Means Analysis of Variance on Frequency of Marijuana Use

| <u>Source</u>     | <u>SS</u> | <u>df</u> | <u>MS</u> | <u>F</u> |
|-------------------|-----------|-----------|-----------|----------|
| Sex               | 14.23     | 1         | 14.23     | 2.01     |
| Class             | 27.13     | 3         | 9.04      | 1.27     |
| Residence         | 59.73     | 2         | 29.87     | 4.21*    |
| Sex X Class       | 7.83      | 3         | 2.61      | .37      |
| Class X Residence | 11.71     | 6         | 1.95      | .27      |
| Sex X Residence   | 1.05      | 2         | .52       | .07      |
| SS within groups  | 13,586.86 | 1915      |           |          |

\* Significant beyond .05 level

Table 4.

## Multiple Regression Equations Predicting Frequency of Drug Use\*

| Drug      | N   | R   | R<br>Cross<br>Validated | Constant | Regression Weights <sup>†</sup> with question<br>number in parentheses above. |       |      |      |      |      |      |      |  |  |
|-----------|-----|-----|-------------------------|----------|---|-------|------|------|------|------|------|------|--|--|
| Marijuana | 868 | .47 | .46                     | 2.94     | (21)  | (8)   | (12) |      |      |      |      |      |  |  |
|           |     |     |                         |          | +.48  | -.44  | +.39 |      |      |      |      |      |  |  |
| Hashish   | 630 | .35 | .34                     | 5.05     | (21)  | (8)   | (9)  |      |      |      |      |      |  |  |
|           |     |     |                         |          | +.43  | -.29  | -.20 |      |      |      |      |      |  |  |
| Speed     | 318 | .30 | .28                     | 4.77     | (12)  | (2)   | (1)  | (21) | (17) |      |      |      |  |  |
|           |     |     |                         |          | -.43  | +.35  | +.32 | +.27 | -.20 |      |      |      |  |  |
| Mescaline | 243 | .24 | .20                     | 3.77     | (12)  | (11)  | (1)  | (15) | (16) | (9)  | (19) | (17) |  |  |
|           |     |     |                         |          | -.51  | +.49  | +.18 | -.18 | +.17 | -.10 | +.08 | -.08 |  |  |
| LSD       | 184 | .38 | .35                     | 1.90     | (2)   | (21)  | (22) | (14) |      |      |      |      |  |  |
|           |     |     |                         |          | -.51  | +.44  | +.21 | +.12 |      |      |      |      |  |  |
| DMT       | 89  | .46 | .40                     | 2.07     | (11)  | (2)   | (13) | (15) | (9)  | (17) | (14) | (10) |  |  |
|           |     |     |                         |          | +.52  | -.45  | -.40 | +.24 | -.18 | +.15 | +.14 | +.09 |  |  |
| Cocaine   | 72  | .55 | .42                     | 2.91     | (13)  | (12)  | (2)  | (21) | (14) |      |      |      |  |  |
|           |     |     |                         |          | -1.38   | +1.09 | -.55 | +.41 | +.16 |      |      |      |  |  |
| Heroin    | 26  | .88 | .51                     | -1.25    | (1)   | (10)  | (13) | (9)  | (14) | (22) | (17) |      |  |  |
|           |     |     |                         |          | +1.06   | +.90  | -.65 | -.49 | +.45 | +.41 | +.31 |      |  |  |

\* Only users included in analysis

† Variables added to equation until R increased by .01 or less.  
"Other" dropped from item 1. See Tables 7 and 8 for items.



Table 5.

## Reasons for Non Use of "Marijuana" or "Drugs"\*

| <u>Item</u>   | <u>Rank On<br/>Poll A<br/>(Marijuana)</u> | <u>Rank On<br/>Poll B<br/>(Drugs)</u> | <u>Total<br/>Sample</u> |
|---|---|---------------------------------------|-------------------------|
| Reports (or experiences) of harmful psychological effects   | 3   | 2                                     | 2                       |
| Reports (or experiences) of harmful physical effects        | 5   | 4                                     | 5                       |
| Observations of effects in others                           | 4   | 3                                     | 4                       |
| Urging or potential disapproval from parents, friends, etc. | 6   | 7                                     | 6                       |
| Illegality  | 2   | 5                                     | 3                       |
| Difficulty in obtaining substance                           | 8   | 8                                     | 8                       |
| No desire to experience its effects                         | 1   | 1                                     | 1                       |
| Afraid of becoming addicted                                 | 7   | 6                                     | 7                       |

\* Ranks: 1= most frequent reason to 8=least frequent reason

Table 6.

## Reasons for Use of "Marijuana" or "Drugs"\*

| <u>Item</u>   | <u>Rank On<br/>Poll A<br/>(Marijuana)</u> | <u>Rank On<br/>Poll B<br/>(Drugs)</u> | <u>Total<br/>Sample</u> |
|---|---|---------------------------------------|-------------------------|
| Explore inner self  | 8   | 6                                     | 7                       |
| For religious or mystical feeling                                 | 12  | 12                                    | 12                      |
| Relieve boredom   | 5   | 3                                     | 5                       |
| Feel less depressed or sad  | 7   | 8                                     | 8                       |
| Relieve general anxiety, tension, nervousness and/or irritability | 3   | 4                                     | 3                       |
| Shut things out of my mind  | 10  | 9.5                                   | 10                      |
| Prepare for stress  | 12  | 11                                    | 11                      |
| Experience things more vividly                                    | 2   | 2                                     | 2                       |
| Make a good mood last longer or make a fine feeling better        | 4   | 5                                     | 4                       |
| To be more friendly, enhance sociability and/or be more loving    | 6   | 7                                     | 6                       |
| To be like others I admire  | 14  | 13.5                                  | 14                      |
| Go along with what others are doing                               | 9   | 9.5                                   | 9                       |
| Enjoy doing something illegal or "forbidden"                      | 12  | 13.5                                  | 13                      |
| Get high, feel good   | 1   | 1                                     | 1                       |

\* Ranks: 1= most frequent reason to 14= least frequent reason

Table 7.

## Means and Standard Deviations for 15 Attitudinal Items\*

| <u>Item</u>   | <u>Mean*</u> | <u>S.D.</u> |
|---|--------------|-------------|
| 8. Marijuana should be legalized.   | 2.56         | 1.31        |
| 9. All drugs should be legalized  | 4.46         | .94         |
| 10. If I were aware of someone USING MARIJUANA I would report them to the proper authorities.                             | 4.31         | .95         |
| 11. If I were aware of someone USING OTHER DRUGS I would report them to the proper authorities.                           | 4.00         | 1.09        |
| 12. If I were aware of someone SELLING MARIJUANA I would report them to the authorities.                                  | 3.80         | 1.28        |
| 13. If I were aware of someone SELLING OTHER DRUGS I would report them to the authorities.                                | 3.33         | 1.40        |
| 14. I would NOT attend a drug education program on campus.  | 3.43         | 1.22        |
| 15. A drug counseling service should be provided for students.  | 1.69         | .89         |
| 16. The Student Government Association should fund a drug counseling center.  | 2.20         | 1.09        |
| 17. I DO NOT feel sorry for people on drugs.  | 3.31         | 1.23        |
| 18. If the University has knowledge of a student USING MARIJUANA they should turn him over to the proper authorities.     | 3.91         | 1.14        |
| 19. If the University has knowledge of a student USING OTHER DRUGS they should turn him over to the proper authorities.   | 3.46         | 1.27        |
| 20. If the University has knowledge of a student SELLING MARIJUANA they should turn him over to the proper authorities.   | 3.28         | 1.38        |
| 21. If the University has knowledge of a student SELLING OTHER DRUGS they should turn him over to the proper authorities. | 2.74         | 1.40        |
| 22. If I were using drugs and felt a need for counseling, I would go to the University Counseling Center.                 | 2.29         | 1.11        |

\* 1= Strongly agree; 5=Strongly disagree (N=2,141)

Table 8.

## Factor Loadings for Three Varimax Rotated Factors\*

| <u>Item</u> <sup>†</sup>                   | <u>I</u> | <u>II</u> | <u>III</u> | <u>h<sup>2</sup></u> |
|--|----------|-----------|------------|----------------------|
| 1. Class (1=Fr., 4=Sr.)                    | -.02     | -.06      | -.14       | .02                  |
| 2. Sex (1=Male, 2=Female)                  | .03      | .10       | .19        | .05                  |
| 5-1. Marijuana Use                         | .59      | .55       | .07        | .66                  |
| 5-2. Hashish Use                           | .51      | .61       | .09        | .64                  |
| 5-3. Speed Use                             | .29      | .66       | .10        | .54                  |
| 5-4. Mescaline Use                         | .23      | .76       | .09        | .64                  |
| 5-5. LSD Use                               | .19      | .75       | .07        | .61                  |
| 5-6. DMT Use                               | .06      | .70       | .05        | .50                  |
| 5-7. Cocaine Use                           | .03      | .71       | .04        | .51                  |
| 5-8. Heroin Use                            | -.05     | .58       | .04        | .34                  |
| 8. Legalize marijuana                      | -.60     | -.19      | -.03       | .39                  |
| 9. Legalize drugs                          | -.18     | -.17      | -.25       | .13                  |
| 10. I report marijuana users               | .75      | .04       | -.22       | .61                  |
| 11. I report other drug users              | .77      | .06       | -.12       | .61                  |
| 12. I report marijuana sellers             | .83      | .07       | -.02       | .70                  |
| 13. I report other drug sellers            | .73      | .11       | .10        | .55                  |
| 14. Would not attend drug education        | .05      | .03       | -.29       | .09                  |
| 15. Provide drug counseling                | -.07     | -.04      | .59        | .35                  |
| 16. SGA should fund                        | -.08     | -.06      | .54        | .30                  |
| 17. Do not feel sorry for users            | .01      | -.05      | -.25       | .07                  |
| 18. University turn in marijuana users.    | .76      | .10       | -.15       | .60                  |
| 19. University turn in other drug users.   | .75      | .12       | .00        | .58                  |
| 20. University turn in marijuana sellers.  | .83      | .13       | .04        | .71                  |
| 21. University turn in other drug sellers. | .73      | .17       | .23        | .62                  |
| 22. Would go to Counseling Center          | .03      | .02       | .31        | .10                  |

\*The three factors accounted for 100% of the common variance.

†See Table 7 for complete items 8-22.