

Positive and negative consequences of alcohol consumption in college students.

Park CL. *Addictive Behaviors* 29(2): 311-321, 2004. (20 refs.)
While the negative consequences of alcohol use in college students are well known, less is known about the relationships of these consequences to alcohol consumption patterns. Further, almost no research has been conducted examining students' positive alcohol-related consequences. The current study examines the nature and frequency of positive and negative alcohol-related consequences, the relationship of these consequences to alcohol consumption patterns, and the impact of these consequences on subsequent drinking intentions. Findings indicate that college student drinking does indeed involve many negative consequences, some of which are quite serious, but that students also experience many positive consequences. In fact, they report their encounters with positive consequences as being more extreme and more frequent than their encounters with negative consequences. Further, consuming more alcohol is related to experiencing more positive and more negative consequences, as well as more extremely positive positive encounters, but not more extremely negative negative ones. Finally, participants reported that their positive and negative consequences would influence their future drinking decisions in a number of different ways. Future research directions and implications for interventions are discussed. Copyright 2004, Elsevier Science.

College students and problematic drinking: A review of the literature.

Ham LS; Hope DA. *Clinical Psychology Review* 23(5): 719-759, 2003. (152 refs.)
Problem drinking during the college years is a significant public health concern. The goal of the current review was to examine the primary psychosocial factors that predict problem drinking in college students. Variables examined included demographic variables, personality, drinking history, alcohol expectancies, drinking motives, stress and coping, activity involvement, and peer and family influence. Evidence from studies of college drinking indicated that the variables associated with college drinking seem to vary at levels dealing with one's personality and coping mechanisms, one's thought processes about drinking, and the environment. It seems that expectancies and drinking motives may serve as explanations for the pathways from certain personality types (i.e., sensation seeking and neurotic) to problem drinking in the college setting. Factors that predicted future drinking problems after college were also examined. Overall, it seems that interventions and prevention programs would need to reach college students at all three levels -- the environment, individual

personality traits, and cognitive processes. Future research should address the limitations in the previous research as well as test comprehensive models of college drinking. Copyright 2003, Elsevier Science.

Do college students drink more than they think? Use of a free-pour paradigm to determine how college students define standard drinks.

White AM; Kraus CL; McCracken LA; Swartzwelder HS. *Alcoholism: Clinical and Experimental Research* 27(11): 1750-1756, 2003. (15 refs.)
Rationale: Much of what is known about college drinking comes from self-report survey data. Such surveys typically ask students to indicate how many drinks they consume within a given period of time. It is currently unclear whether college students and researchers use similar operational definitions of a single drink. This information is critical given the widespread reliance on survey data for assessing the correlates and consequences of college drinking. Objectives: This study investigated whether college students define standard drink volumes in a way that is consistent with the operational definitions commonly used by researchers. Methods: Students (n = 106) were administered an alcohol survey and then asked to perform three tasks. The tasks involved free-pouring fluid into empty cups of different sizes and estimating the volume of a single beer, a shot of liquor, or the amount of liquor in a mixed drink. The volumes poured by students then were compared with standards used in a well-known nationwide survey (i.e., 12 oz of beer and 1.25 oz of liquor in a shot or mixed drink). Results: In every cup size of every task, students overestimated how much fluid they should pour to create a standard drink. In all three tasks, the magnitude of the discrepancy increased with cup size. Collapsed across cup sizes, students overpoured shots by 26%, mixed drinks by 80%, and beer by 25%. When a more liberal serving size of liquor (1.5 oz) was used as the standard, the results of the mixed drink task remained unchanged. However, the volumes poured by students during the shot free-pour task differed from the standard in only one cup size. Conclusions: The data suggest that college students drink more alcohol than indicated by their survey responses, raising questions about the validity of widely used alcohol surveys. Efforts to educate students about the alcohol content of standard drinks should be enhanced. Copyright 2003, Research Society on Alcoholism.

Negative consequences of intercollegiate athlete drinking: The role of drinking motives.

Martens MP; Cox RH; Beck NC. *Journal of Studies on Alcohol* 64(6): 825-828, 2003. (19 refs.)
Objective: Intercollegiate athletes consume more alcohol and experience more negative alcohol-related consequences than nonathletes. The purpose of this study was to determine if drinking motives accounted for variability among

intercollegiate athletes in experiencing negative alcohol-related consequences, and to analyze how the strength and patterns of the relationship between individual drinking motives and negative consequences varied among the different consequences. Method: Self-report data were analyzed on 206 National Collegiate Athletic Association Division I athletes (55% female), selected from a large, midwestern university, who reported drinking alcohol in the past year. Participants completed the Drinking Motives Measure and the Core Alcohol and Drug Survey. Results: Drinking motives accounted for variability in experiencing negative alcohol-related consequences. Drinking for coping reasons displayed the strongest relationship with most of the negative consequences, but for some consequences social and enhancement motives displayed relationships with the consequences that were either similar to or stronger than those of the coping motives. Conclusions: This research demonstrated that drinking motives in general are useful predictors of negative alcohol-related consequences among a yet unstudied population, intercollegiate athletes. The findings suggest that drinking for negatively reinforcing reasons (i.e., coping motives) is generally the strongest motivational predictor of alcohol-related consequences, although the relative strength of individual motives in predicting consequences can vary depending upon the content of an individual consequence. Copyright 2003, Alcohol Research Documentation, Inc. Used with permission.

Sexual identity and substance use among undergraduate students.

McCabe SE; Boyd L; Hughes TL; d'Arcy H. *Substance Abuse* 24(2): 77-91, 2003. (42 refs.)

This study examined the association between sexual identity and use of alcohol and other drugs (AOD) among college undergraduate students. A survey regarding AOD use was administered to a random sample of 3,607 undergraduate students. The sample included 65 self-identified lesbian or bisexual (LB) women and 54 self-identified gay or bisexual (GB) men. Multivariate logistic regression indicated that while alcohol use did not differ for LB and heterosexual women, LB women were significantly more likely to experience certain AOD-related consequences, smoke cigarettes, and use marijuana, ecstasy, and other drugs. GB men were significantly less likely than heterosexual men to drink heavily but were more likely to use some drugs. These findings provide evidence that sexual identity is an important predictor of AOD use among undergraduate students. These findings support the need for continued research and intervention efforts that target LGB collegians. Copyright 2003, Association for Medical Education & Research in Substance Abuse.

Trends in marijuana and other illicit drug use among college students: Results from 4 Harvard School of Public Health College Alcohol Study surveys: 1993-2001.

Mohler-Kuo M.; Lee JE; Wechsler H. *Journal of American College Health* 52(1): 17-24, 2003. (27 refs.)

The authors examined changes in college students' illicit drug use, patterns of polydrug use, and the relationship between students' ages of initiation of substance use and later use of marijuana and other illicit drugs between 1993 and 2001. Data

from 119 US colleges and universities in the Harvard School of Public Health College Alcohol Study were used in the study. They found significant increases in percentages of students' use of marijuana in the past 30 days (from 13% to 17%), past year (from 23% to 30%), and lifetime (from 41% to 47%) between 1993 and 2001, with most of the increase occurring between 1993 and 1997. Past 30-day use of other illicit drugs increased from 4% to 7% and past year use increased from 11% to 14%. More than 98% of marijuana and other illicit drug users used another substance. They also either smoked, were binge drinkers, and/or were users of another illicit drug. Drug prevention programs should emphasize heavy alcohol use and smoking and should start when students are in high school or earlier. Copyright 2003, Heldref Publications.

Changes in heavy drinking over the third decade of life as a function of collegiate fraternity and sorority involvement: A prospective, multilevel analysis.

Bartholow BD; Sher KJ; Krull JL. *Health Psychology* 22(6): 616-626, 2003. (50 refs.)

Although affiliation with a fraternity or sorority is an important risk factor for heavy drinking, recent research indicates that this risk may be limited to the college years. Random coefficient growth modeling was used to track changes in patterns of heavy drinking over the course of 11 years as a function of gender and collegiate Greek involvement (N=318). Overall, greater cumulative exposure to the Greek system led to increased heavy drinking during the college years, particularly among men. Shortly after leaving college, heavy drinking levels dropped markedly and remained low through approximately age 30. Inclusion of peer alcohol use norms in the model reduced the influence of Greek involvement. Implications for models of heavy drinking and health risks are discussed. Copyright 2003, American Psychological Association, Inc. and Division of Health Psychology.

Developing discrepancy within self-regulation theory: Use of personalized normative feedback and personal strivings with heavy-drinking college students.

Neal DJ; Carey KB. *Addictive Behaviors* 29(2): 281-297, 2004. (31 refs.)

Efforts to reduce the frequency of high-risk drinking have included the use of motivational interventions. Both the technique used in motivational interventions and an underlying theory of behavior change (i.e., self-regulation theory) invoke the construct of discrepancy development. This study was designed to determine whether techniques purported to develop discrepancy actually do so and to compare methods of developing discrepancy on indices of intention to reduce alcohol use. Male and female college drinkers (N=92) were selected if they reported two or more binge episodes in the last month, or scored 4 or higher on the Rutgers Alcohol Problem Index (RAPI). Participants were randomly assigned by gender to three conditions all conducted in a small group format: attention-control, personalized normative feedback (PNF), and personal strivings assessment (PSA). Personalized normative feedback was designed to develop discrepancy based on behavioral comparisons of self and others. Personal strivings assessment was designed to develop discrepancy between

current and ideal self. It was hypothesized that participants who engage in discrepancy building activities would experience discrepancy specific to the activity in which they engaged, and that all participants who developed discrepancy would show higher levels of intention to reduce alcohol use. Results indicated that only the personalized normative feedback increased discrepancy and intention to reduce alcohol use. Copyright 2004, Elsevier Science.

Malt liquor use, heavy/problem drinking and other problem behaviors in a sample of community college students.

Chen MJ; Paschall MJ. *Journal of Studies on Alcohol* 64(6): 835-842, 2003. (17 refs.)

Objective: This study examined the prevalence of malt liquor use and its relationship with heavy or problem drinking, other substance use and other problem behaviors in a sample of 1,029 (58% female) students attending a community college in California. Method: Data were collected using anonymous surveys that were administered during daytime classes. Bivariate analyses were conducted to examine relationships between malt liquor use and demographic characteristics, heavy/problem drinking and other types of substance use and problem behaviors. Logistic regression analyses also were conducted to determine whether malt liquor use was predictive of problem drinking, drug use and other problem behavior after adjusting for background variables. Results: Malt liquor use was most prevalent among male, white and Latino students. Compared with nonmalt liquor drinkers, malt liquor drinkers consumed significantly more alcohol, engaged in heavy drinking more often and experienced intoxication more often. Malt liquor drinkers scored significantly higher on the Alcohol Use Disorders Identification Test than nonmalt liquor drinkers. Malt liquor drinkers were more likely than nonmalt liquor drinkers and abstainers to report use of cigarettes, marijuana and illicit drugs and to exhibit problem behaviors. Malt liquor use was predictive of problem drinking, drug use and other problem behavior after adjusting for demographics and alcohol use in regression analyses. Conclusions: The findings of this study suggest that malt liquor use is associated with heavy and problem drinking, other drug use and behavioral problems among community college students. Copyright 2003, Alcohol Research Documentation, Inc. Used with permission.

Outcomes of a federally funded program for alcohol and other drug prevention in higher education.

Licciardone JC. *American Journal of Drug and Alcohol Abuse* 29(4): 803-827, 2003. (41 refs.)

This paper presents the results of the Nationwide Campuses Study that measure the impact of programs supported by the Fund for the Improvement of Postsecondary Education (FIPSE) for collegiate alcohol and other drug (AOD) prevention efforts. Outcomes were measured by using standardized pre- and post-program items on the Core Alcohol and Drug Survey and adjusted prevalences of AOD use. Although student awareness of AOD prevention programs increased during the funding period, there also were increases in the desire for drugs at parties and in the frequencies of arrests for driving while intoxicated or under the influence and of poor academic performance. Adjusted prevalences of alcohol, marijuana, and

cocaine use among students increased, while tobacco use decreased. Curriculum infusion, administrative response, and faculty and community activities most clearly were associated with favorable outcomes. Overall, however, FIPSE funding had limited short-term impact on AOD use and its consequences in higher education. Copyright 2003, Marcel Dekker, Inc. Used with permission.

Perceived social norms and their relation to university student drinking.

Kypri K.; Langley JD. *Journal of Studies on Alcohol* 64(6): 829-834, 2003. (29 refs.)

Objective: The aims of this study were to compare university students' perceptions of drinking norms with actual student drinking norms, to examine the relationship between norm misperception and individual drinking status and to investigate the relative importance of three reference groups as potential determinants of individual drinking levels: young people in New Zealand of the same age and gender, local university students of the same age and gender and the closest friends of individual respondents. Method: In 2002 a randomly selected representative sample of 1,564 New Zealand university students aged 16-29 years completed an Internet-based survey of their alcohol use (response rate: 82%). Respondents were asked to estimate the incidence of heavy episodic drinking and vomiting in the three reference groups and to rate their own drinking in comparison. Estimates within +/-10% of actual norms were rated as accurate; estimates above or below actual norms by more than 10% were rated, respectively, as overestimates and under-estimates. Results: The vast majority of women (80%) and men (73%) overestimated the incidence of heavy drinking among student peers. The incidence of vomiting was also overestimated, but to a lesser extent. The extents of overestimation for both heavy drinking and vomiting were strongly related to the individual's heavy drinking frequency ($p < .001$). Only 9% of drinkers believed they drank more than other students. Correlations of perceived norms and self-reported drinking increased with the proximity of the social grouping to the individual and were higher for women than for men. Conclusions: This New Zealand university sample showed strong evidence of norm misperceptions, consistent with the results of several U.S. studies. Perceived norms are strongly related to individual drinking levels. It is unclear whether norm misperceptions are a cause or effect of heavy drinking. Research in which norm misperceptions are corrected may assist in understanding their importance in the etiology and treatment of heavy drinking. Copyright 2003, Alcohol Research Documentation, Inc. Used with permission.

Preventing alcohol-related harm in college students: Alcohol-related harm prevention program effects on hypothesized mediating variables.

Graham JW; Tatterson JW; Roberts MM; Johnston SE. *Health Education Research* 19(1): 71-84, 2004. (41 refs.)

The Alcohol-related Harm Prevention (AHP) program is a normative education and skill-acquisition program designed to reduce serious, long-term alcohol-related harm in college students. Without admonishing students not to drink, which is likely to fail in many student populations, the AHP program

attempts to give students the necessary perceptions, motivation and skills to intervene within their peer group, and to make proactive harm-avoidance plans with friends prior to social occasions that involve using alcohol. The AHP program is a two-session, in-class intervention that corrects misperceived norms regarding levels of alcohol use, caring about friends, acceptability of risky behaviors and willingness to intervene. The program also makes use of interactive discussions with students and a graded, peer interview assignment to identify and promote harm-prevention strategies. The AHP program was implemented during fall 1999 at a large northeastern university. The program was received very well by students and showed significant effects on the proximal outcomes hypothesized to mediate more distal health-relevant outcomes. Copyright 2004, Oxford University Press.

The College Health Related Information Survey (CHRIS-73): A screen for college student athletes.

Steiner H; Pyle RP; Brassington GS; Matheson G; King M. *Child Psychiatry & Human Development* 34(2): 97-109, 2003. (34 refs.)

Objective: To assess the reliability and discriminate validity of a new screening instrument for college student athletes. Method: 518 Stanford University students completed the proposed instrument (College Health Related Information Survey-CHRIS-73), which was based on the Juvenile Wellness and Health Survey (JWHS-76) but re-designed to assess mental health domains relevant to college athletes. Results: Factor analysis yielded four factors: mental health problems, eating problems, risk behaviors, and performance pressure. Factors were internally consistent, reasonably independent, and clearly discriminated between athletes and non-athletes, and males and females. Conclusions: This study supports the CHRIS-73 as a useful screen for assessing mental health problems among college student athletes. Copyright 2003, Kluwer Academic Press.

The effects of trauma history, gender, and race on alcohol use and posttraumatic stress symptoms in a college student sample.

Marx BP; Sloan DM. *Addictive Behaviors* 28(9): 1631-1647, 2003. (90 refs.)

The present study examined the extent to which different types of traumatic experiences interact with sex and race to effect alcohol use, posttraumatic stress symptomatology, and general psychological distress among a college student sample. Approximately 600 participants completed measures that assessed for a childhood sexual abuse (CSA) history, alcohol consumption, posttraumatic stress symptoms, and overall psychological functioning. Findings indicated that participants with a history of CSA reported greater psychological distress and posttraumatic stress symptoms compared to participants with a trauma history other than CSA and participants with no trauma history. Despite group differences in psychological distress and posttraumatic stress symptoms, no differences in

alcohol use were detected across groups. Gender appeared to affect posttraumatic stress symptoms as a function of group. The implications of the results are discussed. Copyright 2003, Elsevier Science.

Two studies examining environmental predictors of heavy drinking by college students.

Clapp JD; Lange J; Min JW; Shillington A; Johnson M; Voas R. *Prevention Science* 4(2): 99-108, 2003. (25 refs.)

Two sequential studies are presented that examine the validity of a set of environmental variables to predict heavy drinking at college students' most recent drinking occasions. Random telephone interviews (n=1609, n=400) of graduate and undergraduate students attending two large public universities in the southwestern United States were conducted during three separate surveys in 2000 and 2001. An original interview schedule was used and it included measures that examined environmental characteristics of students' most recent drinking events, motivations for drinking, demographics, and alcohol consumption. Using nonparametric exploratory and confirmatory discriminant analyses to distinguish between heavy episodic and nonheavy episodic drinking events, a discriminant function was identified that included the following environmental variables: (1) having many people intoxicated at an event, (2) having illicit drugs available at an event, (3) BYOB events and, (4) the playing of drinking games at the event. The validity of these environmental variables to predict heavy drinking among students was supported in a subsequent study examining a separate sample from the same student population. Environmental factors can be useful to predict heavy drinking events. Copyright 2003, Kluwer Academic Press.

Correlates of college student gambling in the United States.

LaBrie RA; Shaffer HJ; LaPlante DA; Wechsler H. *Journal of American College Health* 52(2): 53-62, 2003. (29 refs.)

The authors report findings from the first national survey of gambling among college students. They collected information from 10,765 students attending 119 scientifically selected colleges included in the 2001 Harvard School of Public Health College Alcohol Study (CAS), which indicated that 42% of responding students gambled in the last school year and 2.6% gambled weekly or more frequently. These findings contradict the widely held opinion based on previous studies that gambling is prevalent among college students. Previous studies used convenience samples that might have overestimated the risk for gambling problems. Male students and students of legal age (greater than or equal to 21 y) were more likely than others to gamble. Availability of gambling, measured by the number of types of gambling venues located in the schools' states, influenced their decisions to gamble. The concordance of characteristics associated with both gambling and binge drinking suggested a disposition to take risks that is independent of the risk objects. Copyright 2003, Mary Ann Liebert, Inc.