Substance Use and Mental Health on College Campuses:

Screening, Prevention, and Brief Interventions



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Points for Consideration

- Substance use and mental health on campus
- Interplay of substance use and mental health issues
- Accessing services
- Prevention/intervention approaches
- Brief interventions: Alcohol
- Extensions to mental health: An example
- · Issues/challenges to consider
- Implications for the college campus

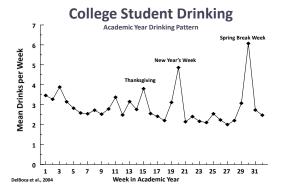
Substance Use Data from Monitoring the Future Study

- Alcohol is still the primary drug of choice
 - Past year
 - 82% report any alcohol use
 - · 67% report having been drunk
- Past month
 - 69% report any alcohol use
 - · 45% report having been drunk

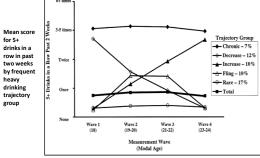




Source: Johnston, et al (2009)



Trajectories of "Binge Drinking" During College



Source: Schulenberg & Maggs (2002), Journal of Studies on Alcohol

Alcohol-Related Consequences

- Within the past 12 months as a consequence of drinking...
 - 22.3% did something they later regretted
 - 19.0% forgot where they were/what they did
 - 10.8% had unprotected sex
 - 10.7% physically injured themselves



n=34,208 from 57 colleges/universities American College Health Association, 2010

Alcohol-Related Consequences (continued)

- Within the past 12 months as a consequence of drinking...
 - 2.6% got in trouble with the police
 - 1.8% physically injured another person
 - 1.5% had sex with someone without giving your consent
 - 1.2% seriously considered suicide
 - 0.3% had sex with someone without getting their consent

American College Health Association, 2010

Substance Use Data from Monitoring the Future Study

- Any illicit drug
- · 35% report past year use
- Marijuana
 - · 32% report past year use
- Any illicit drug other than marijuana
 - 15% report past year use
 - 6.7% Vicodin
 - 6.5% Narcotics other than heroin
 - 5.7% Amphetamines
 - 5.1% Hallucinogens
 - 5.0% Tranquilizers

Lagar.

Source: Johnston, et al (2009)

Mental Health Issues and Academics

- Health issues impact academic success
 - 92% of depressed students show signs of academic impairment (Heiligenstein, et al., 1996)
 - 70% of students seeking counseling reported personal problems affected academics (Turner, 2000)



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Health and Mental Health

- Factors affecting academic performance:
 - 27.8% Stress
 - 20.0% Sleep difficulties
- □ 19.0% Cold/Flu/Sore throat
- □ 18.6% Anxiety
- □ 13.6% Work
- □ 12.6% Internet use/computer games
- □ 11.1% Depression
- 10.4% Concern for a troubled friend/family member

31 unique categories listed, the above were the 8 with prevalence greater than 10%

American College Health Association, 2010



Mental Health: Prevalence

- Blanco and colleagues compared NESARC data from college (n=2188) & non-college (n=2904) young adults
- 45.8% of college students met past year prevalence of any Axis I Psychiatric Disorder, Personality Disorder, or Substance Use Disorder
- 20.4% substance use disorder
- 17.7% personality disorder
- 11.9% anxiety disorder
- □ 10.6% mood disorder

Source: Blanco, et al. (2008)

Issues Experienced in the Past Month from ACHA-NCHA II (Fall 2009)

Stress/Anxiety

- 69.5% overwhelmed by all they had to do
- 29.9% have felt overwhelming anxiety



Anger

• 20.1% felt overwhelming anger

American College Health Association, 2010

Issues Experienced in the Past Month from ACHA-NCHA II (Fall 2009)

Depressed/Sadness/Physical

- 65.8% felt exhausted (not from physical activity)
- 37.5% felt very sad
- 36.1% felt very lonely
- 25.9% felt things were hopeless
- 15.8% felt so depressed it was difficult to function

American College Health Association, 2010

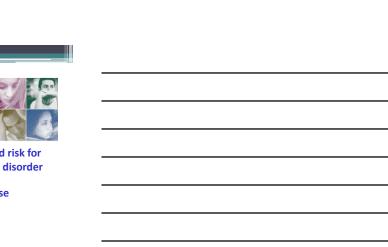
Issues Identified in the Past Year as "Traumatic or Very Difficult To Handle"

- 44.2% identified academics
- 35.6% identified finances
- 30.3% identified intimate relationships
- 27.1% identified family problems
- 24.3% identified sleep difficulties

American College Health Association, 2010

Psychiatric Comorbidity

- 17.0% of college students report lifetime depression diagnosis (ACHA, 2010)
 - □ 20% of women
 - □ 12% of men
- Diagnosis of depression carries increased risk for co-occurring substance abuse or anxiety disorder (Weissman, et al., 1996)
- Co-occurrence of depression and AOD use increases the risk of suicide (Ross, 2004)



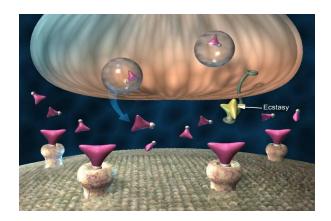
Points for Consideration • Substance use and mental health on campus • Interplay of substance use and mental health issues Accessing services • Prevention/intervention approaches • Brief interventions: Alcohol • Extensions to mental health: An example • Issues/challenges to consider • Implications for the college campus Example: Impact on judgment and decision making **Alcohol Myopia**

Example:

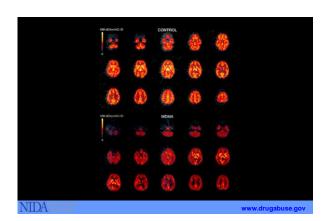
Impact on mood and memory

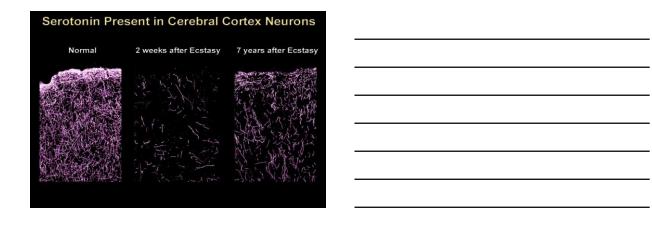










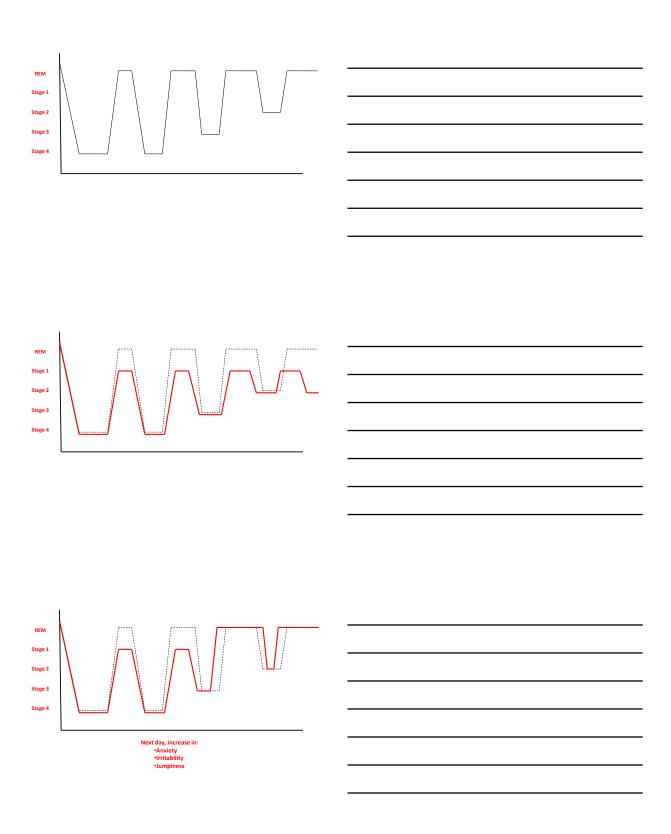


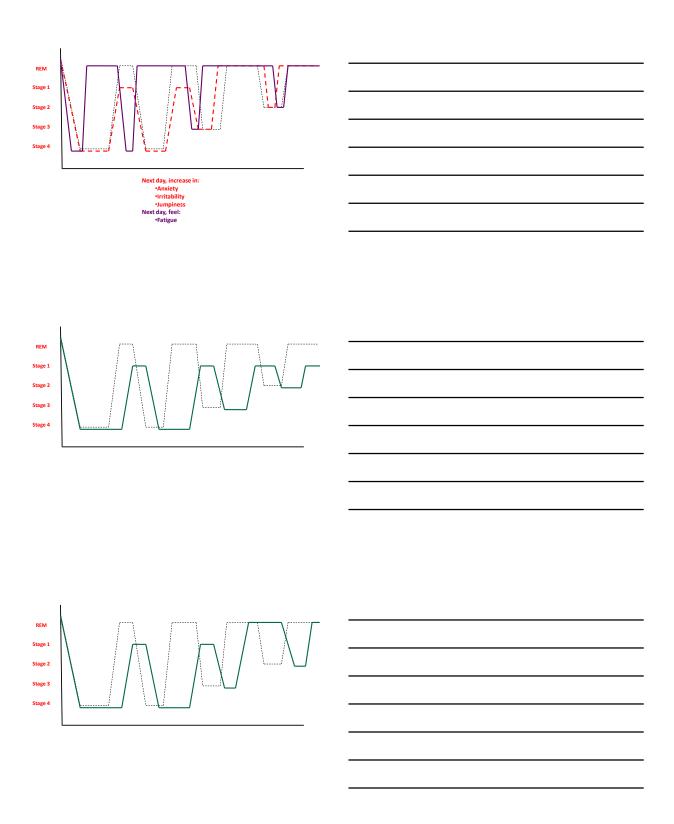
Example:

Impact on sleep

Time to get back to .000%

- .08%?
- 5 hours
- (.080%....064%....048%....032%....016%....000%)
- .16%?
 - □ 10 hours
 - (.160%....144%....128%....112%....096%....080%... .064%....048%....032%....016%....000%)
- · .24%?
 - 15 hours
 - (.240%....224%....208%....192%....176%....160%... .144%....128%....112%....096%....080%....064%... .048%....032%....016%....000%)





Example:

Impact on feelings associated with anxiety and/or attention

Marijuana's impact on the body...

- · Effects on heart rate and blood pressure
 - Increases heart rate
- Raises blood pressure
- Effects on the brain
 - Throws off sleep
 - Impaired learning, attention, memory



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Depression

- 72% of college students who screened positive for major depression felt they needed help
- Only 36% of these received medication or therapy of any kind



Source: Eisenberg, et al., (2007)

Depression

- Factors related to access:
 - Unaware of or unfamiliar with service options
 - Questioned helpfulness of therapy or medication
 - Uncertainty about insurance coverage for mental health visits
 - Less use by students who reported growing up in "poor family"
 - Less use by those identifying as Asian or Pacific Islander

Source: Eisenberg, et al., (2007)

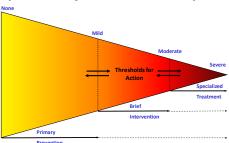
Depression

- Factors related to access:
 - Reasons identified by students:
 - · Lack of perceived need
 - · Belief that stress is normal
 - Lack of time

Source: Eisenberg, et al., (2007)

Alcohol and Drug Use Disorders • Past year prevalence: • Alcohol abuse: 12.5% • Alcohol dependence: 8.1% • Any drug abuse: 2.3% Any drug dependence: 5.6% Wu, et al., (2007) **Alcohol and Drug Use Disorders** • Only 3.9% of full-time college students with an alcohol use disorder received any alcohol services in the past year • Only 2.4% of those who screen positive and did not receive services perceived a need for services Wu, et al., (2007) **Points for Consideration** · Substance use and mental health on campus • Interplay of substance use and mental health issues Accessing services • Prevention/intervention approaches • Brief interventions: Alcohol • Extensions to mental health: An example · Issues/challenges to consider • Implications for the college campus

Spectrum of Intervention Response



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What is Harm Reduction?

- The optimal outcome after a harm reduction intervention *is* abstinence.
- However, harm reduction approaches acknowledge that any steps toward reduced risk are steps in the right direction

How are these principles implemented in an intervention with college students?

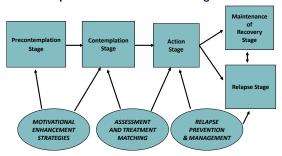
- Legal issues are acknowledged.
- · Skills and strategies for abstinence are offered.
- However, if one makes the choice to drink, skills are described on ways to do so in a less dangerous and less risky way.
- A clinician or program provider must elicit personally relevant reasons for changing.
 - This is done using the Stages of Change model and Motivational Interviewing.

The Stages of Change Model

(Prochaska & DiClemente, 1982, 1984, 1985, 1986)

- Precontemplation
- Contemplation
- Preparation/Determination
- Action
- Maintenance

Stages of Change in Substance Abuse and Dependence: Intervention Strategies



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Motivational Interviewing Basic Principles

(Miller and Rollnick, 1991, 2002)

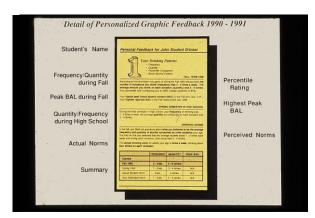
- **Express Empathy**
- 2. **Develop Discrepancy**
- **Roll with Resistance**
- 4. Support Self-Efficacy

The Basics on BASICS

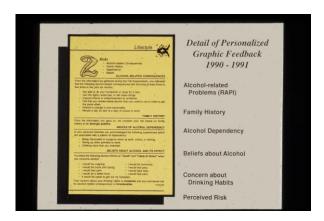
Brief Alcohol Screening and Intervention For College Students

- Assessment
- Self-Monitoring
- •Feedback Sheet
- •Review of Information and Skills Training Content

(Dimeff, Baer, Kivlahan, & Marlatt, 1999)



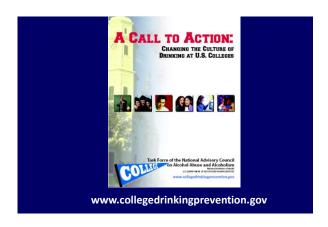
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The 3-in-1 Framework

- Individuals, Including At-Risk or Alcohol-Dependent Drinkers
- Student Body as a Whole
- College and the Surrounding Community

From: "A Call to Action: Changing the Culture of Drinking at U.S. Colleges," NIAAA Task Force

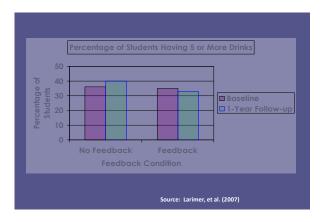
1) Evidence of effectiveness among	
college students	
From: "A Call to Action: Changing the Culture of Drinking at	
U.S. Colleges," NIAAA Task Force	
2) Evidence of success with general	
populations that could be applied to	
college environments	
From: "A Call to Action: Changing the Culture of Drinking at	
U.S. Colleges," NIAAA Task Force	
3) Evidence of logical and theoretical	
promise, but require more	
comprehensive evaluation	
From: "A Call to Action: Changing the Culture of Drinking at	
U.S. Colleges," NIAAA Task Force	

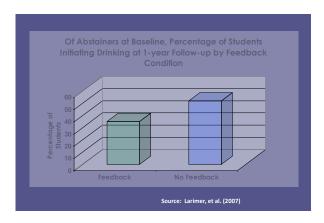
4) Evidence of ineffectiveness	
·	
From: "A Call to Action: Changing the Culture of Drinking at U.S. Colleges," NIAAA Task Force	
Tier 1: Evidence of Effectiveness Among College Students	
Combining cognitive-behavioral skills with norms clarification and motivational enhancement	
interventions. • Offering brief motivational enhancement	
interventions. • Challenging alcohol expectancies.	
From: "A Call to Action: Changing the Culture of Drinking at	
U.S. Colleges," NIAAA Task Force	
Mailed feedback	
Larimer, M.E., Lee, C.M., Kilmer, J.R., et al. (2007). Personalized mailed feedback for college drinking prevention: A	
randomized clinical trial. <i>Journal of Consulting and Clinical</i> Psychology, 75, 285-293.	

Motivating Campus Change (MC²)

- Participants in the feedback condition drank less at follow-up than controls (F(1,872) = 7.18, p<.01)
- Composite score consisting of peak BAC, past month frequency, past year frequency, and total drinks per week

Source: Larimer, et al. (2007)





Points for Consideration • Substance use and mental health on campus • Interplay of substance use and mental health issues Accessing services • Prevention/intervention approaches · Brief interventions: Alcohol • Extensions to mental health: An example • Issues/challenges to consider · Implications for the college campus **Depression** · Several efficacious treatments for depression · However, between 30-40% of depressed individuals do not seek treatment · Only half of those who do seek treatment are offered effective interventions · 44% of those who seek treatment attend 3 or fewer session, with 34% attending 1 or 2 Source: Geisner, Neighbors, and Larimer (2006) **Brief, Mailed Personalized Feedback Intervention** (Geisner, Neighbors, & Larimer, 2006) • Intervention Condition (89 students)

Received personalized feedback
 Included section with:

prevalence of depression

were willing to use

experiencing as problematic

· Validating, empathic statement about the

· Feedback regarding symptoms the student was

· Coping strategies they indicated they had used or

Brief, Mailed Personalized Feedback Intervention (Geisner, Neighbors, & Larimer, 2006)

- Intervention Condition (89 students)
 - Received brochure listing strategies for coping with depressive symptoms
 - Both came by mail one-week post-baseline



























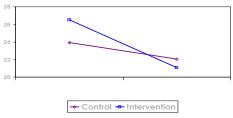
Brief, Mailed Personalized Feedback Intervention (Geisner, Neighbors, & Larimer, 2006)

- Control Condition (88 students)
 - Received brief letter thanking them for participation
 - Paragraph identical to the depression statement received by intervention group
 - Received community resources list

Brief, Mailed Personalized Feedback Intervention (Geisner, Neighbors, & Larimer, 2006)

- "Strong Control Group"
- Simple letters mailed to patients after discharge reduced suicidal behavior in treatment sample (Motto & Bostrom, 2001)
- Design could test additional benefits of the intervention materials

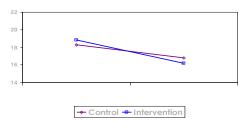
DSM-IV-Based Depression Scale (DDS)



Sign. Time x Group Interaction, p < .05

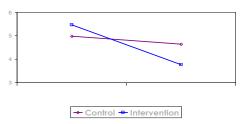
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Beck Depression Inventory



Main effect for time, no significant time x group interaction

Hopelessness Scale (HS)



Sign. Time x Group Interaction, p < .05

Brief, Mailed Personalized Feedback Intervention (Geisner, Neighbors, & Larimer, 2006)

- Factors
 - Loss of pleasure and interest
 - Not significant over time
 - Negative self-thinking
 - Trend toward significant interaction
 - Fatigue
 - Fatigue improved significantly more among intervention than control (p<.05)
 - Concentration difficulties
 - Concentration difficulties improved significantly more among intervention (p<.001)

Brief, Mailed Personalized Feedback Intervention (Geisner, Neighbors, & Larimer, 2006) • Conclusions • Intervention appears to affect "milder" depressive domains or general distress • Mailed intervention reduced numerous barriers with comparable effect sizes while being inexpensive and flexible • Raising awareness of mood, normalizing experience, and emphasizing ways to change may help

Points for Consideration

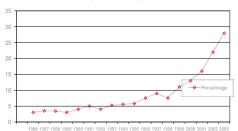
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Are problems with college students becoming more severe?

- 94% of counseling center directors perceive growing concern and/or increase in students with more severe psychological problems (Gallagher, 2009; Barr, 2010)
- 67.3% stayed the same size or lost staff positions (Barr, 2010)
- Over the past 5 years, percentage of directors noting increases in the following problems (Gallagher, 2009):
 - 75.9% Psychiatric medication issues
 - 70.6% Crisis issues requiring immediate response
 - 57.7% Learning disabilities
 - 55.7% Self-injury issues
 - 46.5% Illicit drug use (other than alcohol)
 - 45.0% Alcohol abuse



Percentage of all clients prescribed medication (Schwartz, 2006)



^{**} Data for slide estimated from table appearing in Schwartz, 2006 **

Self-injury data from ACHA-NCHA II

- Past year...
 - 6.1% have seriously considered suicide
- 5.2% have intentionally cut, burned, bruised, or otherwise injured themselves
- 1.3% have attempted suicide
- Past month...
- 2.3% have seriously considered suicide
- 2.2% have intentionally cut, burned, bruised, or otherwise injured themselves
- 0.5% have attempted suicide

American College Health Association, 2010

Factors related to self-injury

- Students were asked (n=5689, 69.6% undergraduate):
- "about ways you may have hurt yourself on purpose, without intending to kill yourself. In the past year, have you ever done any of the following intentionally?"

•Cut myself ·Bit myself

Burned myself

•Banged my head or other body part

 Scratched myself Punched myself •Pulled my hair

•Interfered with wound healing •Carved words or symbols into skin

•Rubbed sharp objects into skin

•Punched or banged an object to hurt

myself •Other

Source: Serras, et al. (2010)

Factors related to self-injury • Past year, 14.3% of students (n=5689, 69.6% undergraduate) reported they hurt themselves without the intent of killing themselves Among undergrads only, 15.8% reported past year SIB (with 19.1% of these reporting cutting) · Drug use associated with higher rates of all forms of self-injury · Highest rate of SIB were grad students who smoked and used illicit drugs (62%) Source: Serras, et al. (2010) Factors related to self-injury • Factors associated with increased odds of SIB: Drug use Cigarette smoking Gambling Depression Sexual orientation Undergraduate student status · Past two-week binge drinking was not a significant predictor on its own, but frequent binge drinking was Authors suggested schools target frequent binge drinking and those using other drugs Source: Serras, et al. (2010) Not much evidence from empirical studies suggesting severity is actually increasing · No general trend but centers may be seeing clients with more complex problems or multiple diagnoses Small rise in extremely distressed students (Cornish, et

al., 2000)

al., 2003)

this problem

with loss of staff positions

Students highly stressful to manage tripled (Benton, et

Consistent increased service demand coupled

· Some individual campuses might actually have

Kettman, et al., 2007

Possible reasons behind perceived increase in severity of psychological problems

 Greater availability of meds could allow students to attend college who otherwise might not have done so (CASA, 2003)



- Hunt and Eisenberg (2010) suggest youth access of effective treatments during adolescence may help function at a level that allows college attendance.
- Lesser stigma attached to mental illness may have led to an increase is seeking psychological services (CASA, 2003)

On student mental health...

"The solution lies in being aware of it, intervening earlier and providing support with adequate and appropriate services."

Nuran Bayram and Nazan Bilgel Uludag University, Bursa, Turkey

Source: Bayram & Bilgel (2008), p. 671

Early identification of students and coordination of care

- 65% of counseling centers have no relationship with the college health center (Schuchman, 2007)
- Only 32.5% of Health Centers routinely screen for alcohol problems
- Of these, only 17% use standardized instruments as part of screening (Foote, et al., 2004)



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Early identification of students and coordination of care

- Routine Screening for depression
 - Of 103 suicides reported by Counseling Center directors, 19% were current or former center clients (Gallagher, 2009)
 - Example: College Depression Partnership (Klein & Chung, 2008)
 - · Screened over 58,000 students in Health Centers at 8 schools
 - · Identified 801 students
 - · Over 35% self-identified as racial/ethnic minority students
 - · Improved clinical outcomes for at-risk, underserved college students by early detection, coordinated proactive follow up, and better adherence to outcomes-based treatment

Early identification of students and coordination of care



- Routine screening for alcohol problems
- Example: Use of AUDIT and referral to BASICS (Martens, et al., 2007)
 - Decreased alcohol use, correction of norm misperception, increased use of protective behaviors

Access to services

- Consider outreach, education, campaigns, or initiatives to address not knowing about:
- Availability
- Potential effectiveness
- Insurance coverage of options
- Also attend to other issues that may impede access to services
 - Address any attitudes about quality of services, lack of awareness of symptom severity, availability of services
- Can only be successful if resources are prepared to support demand for services
 Source: Eisenberg, et al. (2007)

Case Example:

Health & Wellness at the University of Washington

- Housed within Office of Vice Provost and Vice President for Student Life
- Reaches out to students who are on our radar due to:
 - Police report
 - Report from R.A. or R.D.
 - Faculty
 - Health care providers
- Offer meeting with students to check in



Case Example:

Health & Wellness at the University of Washington

- Once students meet with us, can determine how things are going, what's going well, what's going less well, and what services could be available to them
- · Different from judicial
- Can provide outreach in ways
 Counseling Center may not be able to
- Can be used to facilitate referrals to Counseling



Counseling can impact retention

 Turner and Berry (2000) demonstrated that retention rates are higher for college students who get counseling than for those who do not





Counseling can impact retention

- Wilson, Mason, & Ewing (1997) followed
 562 students who requested counseling
- Excluding those who specifically request counseling for retention-related concerns
- 79% of those seen in 1-12 sessions were retained or graduated 2 years since their counseling request
- Only 65% of those who requested services but had not received them were retained or graduated at 2 years

Wilson, Mason, & Ewing (1997)

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Implications for college campuses

- Utilize each other across the state for consultation, professional development, and support
- · Utilize community partners
- If not already doing so, implement "Tier 1" strategies
- Consider strategies to address overlap of mental health issues and substance use
- · Early identification through screening
- Outreach as a part of prevention efforts
- · Consider approaches as part of overall strategic plan
- Reduce barriers to implementation and access

Implications for the college campus	
Meet student interests (possible "foot in the door")	
Weet stadent interests (possible Toot in the door)	
Student access to information	
 61.4% (n=34,208) reported that they had received information on alcohol and other drug use from 	
their college or university - 27.9% say they are interested in receiving information	
about alcohol and other drug use · Soconsider the "hook":	
62.9% want interest in stress reduction 59.6% want information on nutrition	
 52.1% want information in sleep difficulties 52.1% want information on how to help others in distress 	
American College Health Association, 2010	
Implications for the college campus	
Meet student interests (possible "foot in the door")	
 Consider where students get (or could get) health information 	

Believability of health information and where students get information

- 68.1% of college students see faculty/ coursework as believable source of health information
 - This was 3rd of 14 categories, behind...
 - · Health Center Medical Staff (89.9%)
 - · Health Educators (89.8%)
- Only 40.2% get their information from faculty/coursework
 - This was 10th of 14 categories

American College Health Association, 2008

Believability of health information and where students get information

- 78.2% of college students get their health information from the Internet/World Wide Web
 - 1st of 14 categories
- 24.9% of college students see Internet/World Wide Web as a believable source of health information
- 9th of 14 categories
- Evaluate variability in "believability" (e.g., websites linked from the college)

American College Health Association, 2008

Believability of health information and where students get information

- 75.5% of students get their information from parents
 - This was 2nd of 14 categories
- 65.2% of college students see parents as believable source of health information
- This was 4th of 14 categories

American College Health Association, 2008

Implications for the college campus

- Meet student interests (possible "foot in the door")
- Consider where students get (or could get) health information
- Consider the role of other delivery options (e.g., peers, computer-delivered, etc.)
- Continue to evaluate strategies targeting other health issues (including drugs)
- Consider and evaluate environmental, campus-wide prevention approaches
- Build bridges between research and practice on campus

Thank you!

- For more information:
- Jason Kilmer
- jkilmer@u.washington.edu
- Special thanks to:
 - Mary Ellen Nudd
 - Marian Trattner



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