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# Self-Reported Drug Use Six Months after a Brief Intervention: Do Changes in Reported Use Vary by Mental Health Status?

Presentation at Implementing and Sustaining Alcohol and Other Drug Screening and Brief Intervention (AOD-SBI) Meeting September 21, 2011 Boston, MA

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# Background

- Alcohol/drug problems do not always occur in isolation
- Evidence for high level of co-occurring alcohol/drug disorders (COD) and mental illness
  - 37% with alcohol disorder have another mental disorder
  - 50% with drug disorder have another mental disorder
- SBIRT likely to include persons with mental illness
- Brief interventions have been associated with deceased substance use in individuals with COD
- Not known whether persons with evidence of mental illness benefit to same extent as persons who have no evidence of mental illness



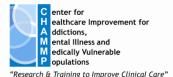
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# **Research Question & Setting**

• Research Question:

#### Does amount of change in self-reported drug use between baseline and follow-up differ by presence of mental health diagnosis?

- SBIRT implemented in 9 emergency departments in WA State
- Patients screened by chemical dependency counselors
- Focus on one site—Harborview Medical Center—with mission to serve low-income uninsured
  - Comprehensive healthcare facility in Seattle owned by King County and managed by the UW
  - HMC performed approximately 17% of the more than 106,000 screenings that took place statewide
- Evidence of mental illness obtained through medical records



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# Sample and Design

- Sample eligibility:
  - Bl
  - AUDIT <u>></u>7 for women and <u>></u>8 for men
  - DAST <u>></u>1
- About 18% of eligibles randomly selected for survey
- Of those selected, 79% interviewed at 6 mos by phone
- Change in substance use based on
  - "During the past 30 days, on how many days have you:
    - Used any illegal drugs?
    - Used any alcohol?
    - Had 5 or more drinks in one sitting?"



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### **Analyses**

- Covariates to control differences between those with and without mental health diagnosis
  - Socio-demographic characteristics
  - Alcohol/drug-related diagnoses and treatment
  - Arrest history (from State Patrol records)
  - Healthcare utilization
  - AUDIT/DAST levels
- Linear regression assessed difference between those with a mental health diagnosis and those without in three models for subsets of individuals
  - Days of illegal drug use: Everyone with a DAST score over 0
  - Days of any alcohol use: Everyone with an AUDIT score of 7 for women, 8 for men
  - Days of binge alcohol use: Everyone with an AUDIT score of 7 for women, 8 for men
- Analyses performed using Stata/IC 11.1





# **Description of Sample**

- About 58% reported using illegal drugs in previous 30 days at baseline:
  - 29% cocaine
  - 36% marijuana
  - 9% methamphetamine, 9% heroin, 5% prescription opiates, 7% other illegal drugs
- 41% had mental health diagnosis in year before BI
- 68% male, mean age = 37.5
- 63% White, 20% Black, 6% Native American, 6% Hispanic, 4% Asian or Other
- 43.1% Uninsured, 33.8% Medicaid, 15.3% Commercial, 5.4% Medicare, 2.4% Other Insurance

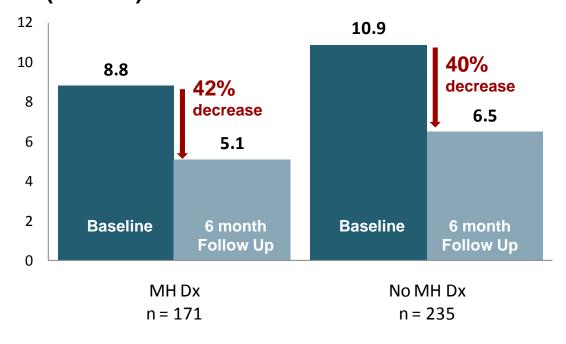




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#### **Results—Days of Illegal Drug Use**

Days of Self-Reported Illegal Drug Use in Prior 30 (n = 406)



Note: Difference between groups n.s. when tested by linear regression

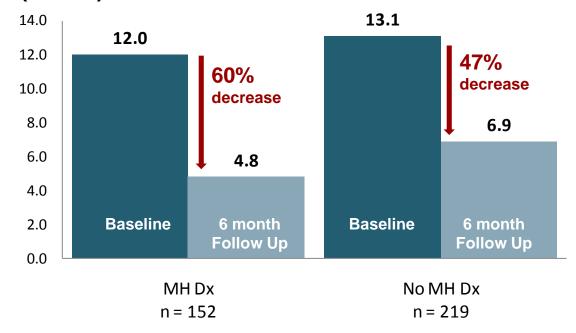




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#### **Results—Days of Any Alcohol Use**

Days of Self-Reported Alcohol Use in Prior 30 (n=371)



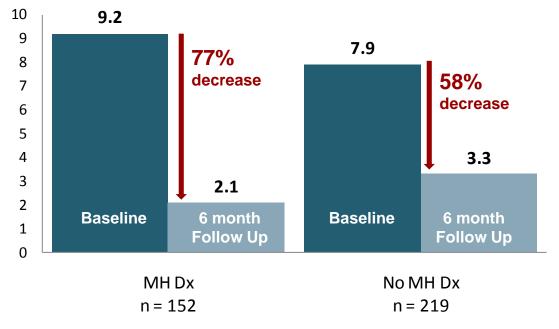
Note: Difference between groups n.s. when tested by linear regression



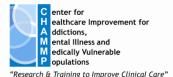
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# **Results—Days of Binge Alcohol Use**





Note: Difference between groups n.s. when tested by linear regression



# Conclusions

- Results consistent with much of existing literature indicating self-reported drug/alcohol use decreases 6 months after receiving a BI
- Lack of a comparison group prevents attributing change in reported use to BI alone but does suggest that *BI may not have a differing impact based on the presence of a mental health diagnosis*
- We encourage future studies that include appropriate comparison groups to further examine this observation





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#### **Thank You!**

