

# Substance Use Disorder: Racial Prevalence and the Likelihood of Participating in an Intervention.

Marya Lieb  
*University of Pennsylvania*

Follow this and additional works at: <http://scholarlyworks.lvhn.org/research-scholars-posters>

---

## Published In/Presented At

Lieb, M., (2017, July, 31) *Substance Use Disorder: Racial Prevalence and the Likelihood of Participating in an Intervention*. Poster presented at: LVHN Research Scholar Program Poster Session, Lehigh Valley Health Network, Allentown, PA.

This Poster is brought to you for free and open access by LVHN Scholarly Works. It has been accepted for inclusion in LVHN Scholarly Works by an authorized administrator. For more information, please contact [LibraryServices@lvhn.org](mailto:LibraryServices@lvhn.org).

# Substance Use Disorder: Racial Prevalence and the Likelihood of Participating in an Intervention

Marya Lieb; Mentors: Drs. Marna Greenberg and Anita Kurt

Lehigh Valley Health Network, Allentown, Pennsylvania

## INTRODUCTION

- The Substance Abuse and Mental Health Services Administration defines substance use disorder (SUD) as “a diagnosis of substance use disorder . . . based on evidence of impaired control, social impairment, risky use, and pharmacological criteria.”<sup>1</sup>
- In Pennsylvania during 2015, 28.36% of adults ages 18 and over used a tobacco product.<sup>2</sup>
- In Pennsylvania during 2015, 6.82% of adults ages 18 and over had alcohol use disorder.<sup>2</sup>
- In the U.S. during 2014, 6.6% of adults ages 18-25 and 1.9% of adults ages 26 and older had an illicit drug use disorder.<sup>3</sup>
- In the U.S. during 2014, 1.2% of adults ages 18-25 and 0.6% of adults ages 26 and older had a pain reliever disorder.<sup>3</sup>
- The purpose of this project was to examine racial differences in the prevalence of SUD among patients using the emergency department (ED) for care at LVHN Muhlenberg (LVHN-M) and Cedar Crest (LVHN-CC) and to identify barriers to participating in a brief motivational interview intervention.



Figure 1. Substance Use Disorder Flow Chart

## METHODS

The focus of this project was to screen patients for SUD in the ED at LVHN-M and LVHN-CC. Screening data captured the substance used, if any, and whether or not an interventional survey was completed. Patients who were approached for interventional interviews were done so based on triage notes related to SUD, past medical history in their Epic chart, or ED provider recommendations. The motivational interview survey used for the study was based on the Yale Project ASSERT program. For the purposes of this project, demographic information, such as race, gender, and age, was added and analyzed. The total prevalence of SUD as well as the prevalence of SUD by race was calculated and compared to the racial composition of the population of the LVHN-M and LVHN-CC areas respectively. Barriers to receiving a motivational interview intervention were identified.

## OUTCOMES

Table 1. LVHN-CC Prevalence and Population Comparison

Race	Percentage in Population	SUD Prevalence Rate
Black/African American	12.5%	6.3%
White	43.2%	82.5%
Asian	2.2%	0.8%
Hispanic/Latino	42.8%	5.8%
American Indian/Alaska Native	0.8%	0.4%
Native Hawaiian/Pacific Islander	<0.5%	0.0%
Other	5.0%	3.3%

Table 2. LVHN-M Prevalence and Population Comparison

Race	Percentage in Population	SUD Prevalence Rate
Black/African American	6.9%	8.7%
White	65.4%	79.7%
Asian	2.9%	1.5%
Hispanic/Latino	24.4%	2.9%
American Indian/Alaska Native	0.3%	0.0%
Native Hawaiian/Pacific Islander	<0.5%	0.0%
Other	3.4%	7.3%

## RESULTS

As seen in Table 1 and Table 2, prevalence of SUD varied in comparison to the racial composition of the population. At LVHN-CC, 82.5% of patients who screened positively for SUD were white, though whites compose merely 43.2% of the population of Allentown. In contrast, Hispanic/Latino patients at LVHN-CC comprised only 5.8% of those with SUD, while the population in Allentown is approximately 42.8% Hispanic/Latino. At LVHN-M, whites had similar discrepancies: 79.7% of patients with SUD were white, which is greater than the percentage found in the population. Hispanic/Latino patients at LVHN-M comprised 2.9% of the total SUD patients while comprising 24.4% of the total population. In total, 32.4% of patients with SUD received an intervention. The most common reasons for lack of an intervention were that the patient was too sick, privacy was not obtainable, or reasons listed as “other.” Overall SUD prevalence rates were 24.3% and 22.3% at LVHN-CC and LVHN-M, respectively. The prevalence of SUD as of 2014 in the nation was 16.3% for ages 18-25 and 7.1% for ages 26 and older.<sup>3</sup>

## CONCLUSIONS

Lack of privacy was identified as the single greatest barrier to reception of an intervention. The most common reasons listed as “other” included patients who presented for psychiatric reasons, patients who were sleeping, and patients who were moved to other beds. In order to ensure that patients with SUD have the ability to receive an intervention, it is necessary to eliminate as many barriers to care as possible. Namely, adequate privacy for interventions needs to be attainable. Patients who use the emergency department for psychiatric reasons should not be automatically disqualified and should be considered for an intervention if applicable. Researchers conducting the interventions must be persistent in their goal of reaching all SUD patients.

1. The Substance Abuse and Mental Health Service Administration. (2015, October 27). *Substance Use Disorder*. Retrieved from <https://www.samhsa.gov/disorders/substance-use>  
 2. The Substance Abuse and Mental Health Service Administration. (n.d.). *2014-2015 National Survey on Drug Use and Health: Model-Based Prevalence Estimates (50 States and the District of Columbia)*. Retrieved from <https://www.samhsa.gov/data/sites/default/files/NSDUHsaePercents2015.pdf>  
 3. Hedden, S.L., Kennet, J., Lipari, R., Medley, G., Tice, P. (2015, September). *Behavioral Trends in the United States: Results from the 2014 National Survey on Drug Use and Health*. Retrieved from <https://www.samhsa.gov/data/sites/default/files/NSDUH-FRR1-2014/NSDUH-FRR1-2014.pdf>

Special thanks to Dr. Anita Kurt, Dr. Marna Greenberg, Manuel Colón, Bernadette Glenn-Porter, and Micaela Wilson for all of their assistance with this project.

© 2017 Lehigh Valley Health Network

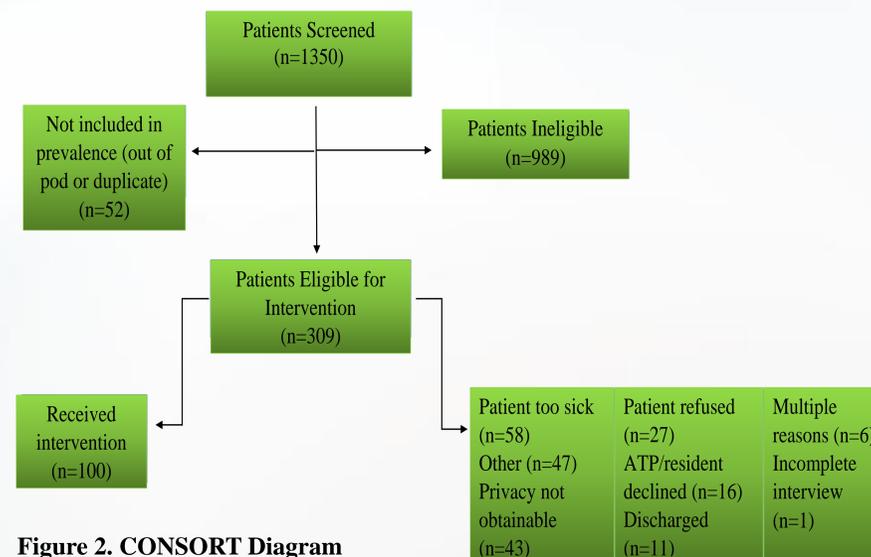


Figure 2. CONSORT Diagram