Alcohol, Marijuana, and Illicit Drug Use at the Intersection of Sexual Identity and Race/Ethnicity in a National Sample of High School Youth

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Background

LGBTQ* youth are more likely to use alcohol, marijuana, and illicit substances than heterosexual youth, and rates of substance use have risen among racial/ethnic minority youth in the past two decades.1,2,3 Adolescence is the most common age at which substance use is initiated, and early onset substance use is a strong predictor of substance use disorders later in life.4

Objective

This study sought to address two primary research aims:
1) To evaluate the interacting effects of race/ethnicity and sexual identity on the outcomes of alcohol use, marijuana use, and illicit drug use in high school youth
2) To consider the associations of depression, bullying, victimization and violence on substance use outcomes among youth, based on sexual identity and race/ethnicity

Methods

This project was a secondary analysis of publicly available data from the national Youth Risk Behavior Survey (YRBS) conducted by the Centers for Disease Control and Prevention (CDC). Data was pooled from 2015, 2017 and 2019 cycles of the YRBS. The total sample consisted of 44,066 youth. The data were representative of youth attending high schools across the United States. Variables included in the study are depicted in Table 1.

Results

Sequential multivariable logistic regression models were fitted to produce adjusted odds ratios (AORs) for alcohol, marijuana, and illicit drug use, with main effects and interaction effects for sexual identity and race/ethnicity. Associations between sexual identity and race/ethnicity on substance use outcomes were assessed before and after psychosocial variables were added to the models.

Results (continued)

Discussion

This study was the first of its kind to apply interaction effects for sexual identity by race/ethnicity to study the relationship between intersecting identities and youth substance use, while accounting for the role of related psychosocial factors, in a nationally representative sample. Significant interaction effects were found for Black gay, lesbian or bisexual youth for alcohol use and illicit drug use, even when controlling for psychosocial factors. To an extent, these findings are consistent with the idea that multiple-minority groups face heightened levels of minority stress, due to systems of oppression that work together. This study also expands on prior findings by identifying Black gay youth as a particularly vulnerable population for substance use.

The results highlight the importance of considering both sexual identity and race/ethnicity when studying substance use among youth. Understanding the unique experiences and challenges faced by LGBTQ youth can inform targeted interventions and policies to support their health and well-being.

References


Table 1: Measures

<table>
<thead>
<tr>
<th>Variable</th>
<th>Current Alcohol Use</th>
<th>Current Marijuana Use</th>
<th>Lifetime Illicit Drug Use</th>
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</thead>
<tbody>
<tr>
<td>AOR (95% CI)</td>
<td>AOR (95% CI)</td>
<td>AOR (95% CI)</td>
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<tr>
<td>1.85 (1.03-3.29)</td>
<td>1.74 (1.00-3.03)</td>
<td>2.69 (1.65-8.28)</td>
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<tr>
<td>1.41 (0.75-2.69)</td>
<td>1.28 (1.21-2.03)</td>
<td>1.13 (1.04-2.35)</td>
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<tr>
<td>2.24 (1.60-3.13)</td>
<td>68 (50-93)</td>
<td>1.57 (0.92-2.51)</td>
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<tr>
<td>1.24 (0.95-1.65)</td>
<td>38 (86-156)</td>
<td>73 (50-100)</td>
<td></td>
</tr>
</tbody>
</table>
| 1.44 (1.75-7.6) | 88 (54-1.41) | 1.21 (1.64-2.8)
| 1.64 (1.11-2.42) | 1.36 (1.90-2.01) | 91 (51-1.65) |

Note. *p<.05; **p<.01; ***p<.001. Models also controlled for sex, grade in school and related psychosocial factors.