**Introduction**

- Incarcerated women report elevated rates of experiencing childhood and adulthood sexual abuse, with over half of women reporting victimization across the lifespan (Lynch et al., 2017; Walsh, DiLillo, & Scalora, 2011).
- Exposure to interpersonal violence increases the risk of Substance Use Disorders among incarcerated women (Green et al., 2016; Lynch et al., 2017).
- Other research with incarcerated women has indicated that lower perceptions of control over recovery from trauma impacts substance use severity (Grella & Messina, 2016).
- However, less is known about how experiences of sexual violence may impact coping self-efficacy and substance use.

**The Present Study**

This study examined cumulative experiences of sexual violence in adulthood and childhood, trauma coping self-efficacy, and substance use severity among women in jail.

Specifically, we 1) examined the prevalence of sexual violence, 2) examined the extent to which cumulative sexual violence predicted trauma coping self-efficacy and substance use severity, and 3) investigated whether there was an indirect effect of trauma coping self-efficacy on cumulative sexual violence and substance use severity.

**Method**

The sample for this project included 146 randomly selected women who were recruited from two jails in southeastern Idaho.

Women ranged in age from 18-61 (M=31.95, SD=9.42). Participants self-identified as White/European-American (36.4%), Native American/American Indian (6%), European (5.6%), Hispanic (5.6%), African-American/Black (1.6%), Asian-American (.4%), and other (.8%).

**Findings**

- Almost three quarters of the women (73%) reported experiences of childhood sexual abuse, 34.9% who reported adulthood sexual abuse, 50% who reported rape in childhood, and 36.3% who reported rape in adulthood.
- On average, women reported 17.5 (SD=10.4) substance use symptoms, which indicates that most women use multiple substances.
- First, a linear regression was used to examine cumulative sexual violence as a predictor of trauma coping self-efficacy and substance use severity. Cumulative sexual violence was a significant predictor of current trauma coping self-efficacy (β = -.355, SE = .13, t = -2.81, p < .01) and current substance use (β = .572, SE = .12, t = 4.84, p < .001). (Table 1).
- Next, the indirect effect of trauma coping self-efficacy on cumulative sexual violence and substance use severity was tested using the PROCESS macro (Hayes, 2017). When sexual violence and trauma coping self-efficacy were both included in the model as predictors, the direct association between sexual violence and substance use was reduced but still significant (β = .554, SE = .12, t = 4.76, p < .001), indicating partial mediation. (Figure 1).
- The confidence interval for the indirect effect of trauma coping self-efficacy did not include zero (point estimate = .07, 95% CI: [.006, .162]).

**Discussion**

Consistent with previous literature, incarcerated women reported high rates of experiences sexual violence and substance use.

As hypothesized, cumulative sexual violence predicted higher substance use severity and lower trauma coping self-efficacy, suggesting that women who experience higher rates of sexual abuse are at increased risk of using substances and low coping self-efficacy.

Additionally, our findings suggest that trauma coping self-efficacy has a small, significant indirect effect on the relation between sexual violence and substance use symptoms, such that women who reported increased sexual violence might experience higher substance use severity related to their decreased ability to cope effectively.

The rates of sexual violence and substance use in this sample suggests the importance of both mental health assessment and treatment for this population to decrease negative outcomes. Treatments targeting co-occurring trauma and substance use may be particularly important for these women.

Limitations include the cross-sectional design of the study. Future research should investigate different types of sexual violence and examine other mental health symptoms.

![Figure 1. Indirect effect model](image)

**Table 1. Linear regression analyses estimating effects of cumulative sexual violence on substance use severity and trauma coping self-efficacy.**

<table>
<thead>
<tr>
<th>Variable</th>
<th>β</th>
<th>SE</th>
<th>p</th>
<th>df</th>
<th>F</th>
<th>R²</th>
</tr>
</thead>
<tbody>
<tr>
<td>Substance use severity</td>
<td>.572</td>
<td>.118</td>
<td>&lt;.001</td>
<td>1,132</td>
<td>23.466</td>
<td>.151</td>
</tr>
<tr>
<td>Trauma coping self-efficacy</td>
<td>-.355</td>
<td>.127</td>
<td>.006</td>
<td>1,138</td>
<td>7.868</td>
<td>.054</td>
</tr>
</tbody>
</table>

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