Recovery High Schools as a Protective Factor against the Progression of Substance Use & Co-Occurring Disorders

Dr. Andy Finch
Vanderbilt University

Opioid Response Network Webinar Series
September 28, 2022
Substance Use Disorders and Treatment by Age Group

**Aged 12 to 17**

Among adolescents aged 12 to 17 in 2019, 0.7 percent (or 172,000 people) received any substance use treatment in the past year (Figure 65 and 2019 DT 7.51). These estimates in 2019 were similar to the estimates in 2015 to 2018.

**Aged 18 to 25**

Among young adults aged 18 to 25 in 2019, 1.7 percent (or 578,000 people) received any substance use treatment in the past year (Figure 65 and 2019 DT 7.51). These estimates in 2019 were similar to the estimates in 2015 to 2018.

**Figure 45. Substance Use Disorder in the Past Year among People Aged 12 or Older: 2015-2019**

**Figure 45 Table. Substance Use Disorder in the Past Year among People Aged 12 or Older: 2015-2019**

<table>
<thead>
<tr>
<th>Age</th>
<th>2015</th>
<th>2016</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>12 or Older</td>
<td>7.8</td>
<td>7.5</td>
<td>7.2</td>
<td>7.4</td>
<td>7.4</td>
</tr>
<tr>
<td>12 to 17</td>
<td>5.0</td>
<td>4.3</td>
<td>4.0</td>
<td>3.7*</td>
<td>4.5</td>
</tr>
<tr>
<td>18 to 25</td>
<td>15.3*</td>
<td>15.1*</td>
<td>14.8</td>
<td>15.0</td>
<td>14.1</td>
</tr>
<tr>
<td>26 or Older</td>
<td>6.9</td>
<td>6.6</td>
<td>6.4</td>
<td>6.6</td>
<td>6.7</td>
</tr>
</tbody>
</table>

* Difference between this estimate and the 2019 estimate is statistically significant at the .05 level.
Recovery High Schools
Poem recited by Maggie Ratley, 2021

The deep deep tragedies
That walk about this school
The victimized
The invisible
The raw and angry souls
That have every right to be
I may be older in years
But their maturity is visible in their eyes
Eyes that reflect years of suffering
Well beyond their actual birthdates
And they tell me their stories
And sometimes it is almost too much to listen
I don't want to hear
I don't want it to be true
Somebody tell me how this could be
Why is the world so silent
When there is all of this horror around us?109
And they even have gratitude
If I had not experienced that, they say
Then I wouldn't be me today
And I am awed and amazed
I am deeply impressed
When I hear them
I listen to them
And I am learning so much
About not taking for granted
About honesty
And the danger of lies
Even the smallest
About facing myself
And not pretending I am anything I am not
So much of their lives ahead of them
And yet every day is a struggle
To remember that escaping doesn't help
It may feel like it helps
Or at least they won't feel anything
Which is better than reality sometimes
And they have to remind each other
That escaping leads to nowhere
And they have all been there
And miraculously / They have come back alive
A. Primary purpose is to educate students in recovery from substance use or co-occurring disorders.

B. Meet state requirements for awarding a secondary school diploma, i.e. school offers credits leading to a state-recognized high school diploma, and student is not just getting tutored or completing work from another school while there.

SOURCE: Association of Recovery Schools, 2013
C. Intent that all students enrolled be in recovery and working a program of recovery from substance use or co-occurring disorders as determined by the student and the School;

D. Available to any student in recovery who meets state or district eligibility requirements for attendance, i.e., students do not have to go through a particular treatment program to enroll, and the school is not simply the academic component of a primary or extended-care treatment facility or therapeutic boarding school.

SOURCE: Association of Recovery Schools, 2013
WHAT RECOVERY HIGH SCHOOLS ARE & ARE NOT...

- Are places youth enroll voluntarily
- Promote abstinence for all youth who choose to attend
- Enroll students following different pathways to recovery
- Value student leadership, ownership, and voice
- Are not treatment programs and are not designed to provide primary treatment
- Do not usually require prior participation in any form of treatment
- Do not supplant or replace treatment
- Do not replace mental health treatment or ongoing services
- Some students may not benefit from an RHS, based on where they are in the stages of change... Are uniquely situated to refer these youth to the services they need
Origins

Freedom Road School
Charleston, SC
1973

PDAP GED School
Houston, TX
1976

Phoenix I, 1979
Silver Spring, MD

Phoenix II, 1983
Gaithersburg, MD
Origins

Sobriety High
1987-2013

PEASE Academy 1989-present
1971 - PDAP becomes 1st APG
1973 - Charleston school district partners with tx ctr on a school for students with SUDs
1976 - GED school becomes 1st school for youth in recovery not affiliated with tx program
1979 - Phoenix School opens in Silver Spring, MD
2002 - ARS hosts 1st Conference in Washington
2022: 45 schools

Avg. Lifespan: 10 yrs
Hope Academy

Accredited Recovery High Schools

- Archway Academy (Houston)
- P.E.A.S.E Academy (Minneapolis)
- Insight Program (White Bear Lake, MN)
- William J. Ostiguy High School (Boston)
- Hope Academy (Indianapolis)
- Mission Academy (Oklahoma City)
- University High School (Austin, TX)

https://www.youtube.com/watch?v=AYCVEJ5rD1M&t=150s
Student Engagement

The semester student enrollment of reporting recovery schools, the gender distribution among that student population, and the activities that contribute to recovery school attendance.

2-115
Range of Students Enrolled in a Recovery High School

Average Student Enrollment is 32
THERAPEUTIC PROGRAMS

- Generally eclectic orientations
- All have counselor/therapist involved, some contracted/outsourced to treatment programs
- Counseling staff credentials vary (most have licensed A&D counselors, LPCs, LMFTs, and/or social workers).
Alternative Peer Groups

Community-based, family-centered, professionally staffed, positive peer support program that offers prosocial activities, counseling, and case-management for people who struggle with substance use or self-destructive behaviors (Collier)

SOURCE:
https://www.semanticscholar.org/paper/Alternative-Peer-Group-%3A-A-Model-for-Youth-Recovery-Collier-Hilliker/74424b9e12f2f00dd9ff941afbfdf866f729417f
Acknowledgements

• Supported by the National Institute On Drug Abuse of the National Institutes of Health under award number R01DA029785. This project has also benefited from the Clinical and Translational Science Award (CTSA) program, through the NIH National Center for Advancing Translational Sciences (NCATS) grant UL1TR000427. The content is solely the responsibility of the authors and does not necessarily represent the official views of the National Institutes of Health.

• Lead investigators:
  Paul Moberg, Ken Winters, John Grabowski, Sheila Specker, and Luis Torres

• Key Collaborators:
  Mark Lipsey, Emily Tanner-Smith, Emily Fisher Hennessy
  Andria Botzet, Christine Dittel, Tamara Fahnhorst, Patrick McIlvaine
  Stephanie Lindsley, Barbara Hill, Falon French, David Weimer
## Baseline Characteristics of Participants

**Twelve Month Pruned Sample (n=187)**

<table>
<thead>
<tr>
<th>Demographics</th>
<th>M (SD) or %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age</td>
<td>16.3 (1.0)</td>
</tr>
<tr>
<td>Male</td>
<td>51%</td>
</tr>
<tr>
<td>White (Non-Hispanic)</td>
<td>78%</td>
</tr>
<tr>
<td>African-American</td>
<td>11%</td>
</tr>
<tr>
<td>Hispanic</td>
<td>9%</td>
</tr>
<tr>
<td>Alcohol Use Disorder</td>
<td>60%</td>
</tr>
<tr>
<td>Other Drug Use Disorder</td>
<td>94%</td>
</tr>
<tr>
<td>Opioid Use Disorder</td>
<td>15%</td>
</tr>
<tr>
<td>Prior treatment for substance use disorder</td>
<td>100%</td>
</tr>
<tr>
<td>Co-Morbid Mental Health Condition (SCID)</td>
<td>92%</td>
</tr>
<tr>
<td>Prior MH Treatment</td>
<td>88%</td>
</tr>
</tbody>
</table>

*Pruned of 23 students outside propensity score balanced range*
# Treatment History

**Twelve Month Pruned Sample (n=187)**

<table>
<thead>
<tr>
<th></th>
<th>SUD Treatment History</th>
<th>MH Treatment History</th>
</tr>
</thead>
<tbody>
<tr>
<td>Inpatient/residential</td>
<td>59%</td>
<td>38%</td>
</tr>
<tr>
<td>Outpatient</td>
<td>84%</td>
<td>80%</td>
</tr>
<tr>
<td>AA/NA</td>
<td>64%</td>
<td></td>
</tr>
<tr>
<td>Ever psychiatric medication</td>
<td></td>
<td>87%</td>
</tr>
<tr>
<td>Days of mental health services in past 90</td>
<td></td>
<td>17</td>
</tr>
</tbody>
</table>
# Mental Health Disorders

(Mini-SCID, percent lifetime)

<table>
<thead>
<tr>
<th>Meets criteria for:</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Major depressive disorder</td>
<td>80</td>
</tr>
<tr>
<td>Generalized anxiety disorder</td>
<td>64</td>
</tr>
<tr>
<td>Antisocial personality disorder</td>
<td>45</td>
</tr>
<tr>
<td>Suicide risk</td>
<td>44</td>
</tr>
<tr>
<td>Panic disorder</td>
<td>38</td>
</tr>
<tr>
<td>Posttraumatic stress disorder</td>
<td>31</td>
</tr>
<tr>
<td>Hypomanic episode</td>
<td>20</td>
</tr>
<tr>
<td>Manic episode</td>
<td>17</td>
</tr>
<tr>
<td>Obsessive-compulsive disorder</td>
<td>12</td>
</tr>
<tr>
<td>Any of the nine MH disorders</td>
<td>92</td>
</tr>
</tbody>
</table>
Compared to students in non-recovery high schools who have received substance use treatment, students in recovery high schools:

(a) have higher graduation rates;

(b) report significantly lower absenteeism;

(c) are more likely to abstain from using substances; and

(d) have significantly fewer days using marijuana and other drugs.

A cost-benefit analysis indicated that the high school graduation rate for recovery high school (RHS) students is at least 20 percentage points higher than the graduation rate for similar students who have had SUD treatment but did not participate in an RHS for at least 30 days.

A conservative estimate of the present value of net benefits of about $32 thousand.
Attendance and Completion

- Students who attended RHSs reported **significantly less overall absenteeism**. RHS attendance was thus associated with over one-half a standard deviation improvement in absenteeism—an effect **equivalent to 5 fewer absences from school over the past 90 days**.

- Students who attended RHSs had **significantly lower odds of dropping out** of high school compared to students attending non-RHSs. The predicted probability of high school dropout was **10% for RHS students and 27% for non-RHS students**.
Mental Health Findings

Both groups significantly improved in mental health over time but there was not a significant difference between RHS and non-RHS students in mental health improvement.

Mental Health Outcomes at Six Months
(adj usted for propensity scores and baseline values)
Cumulative Observations

What have we learned based on our Program of Research?

• RHSs are important option in continuum of recovery support, in particular serve students with
  • Co-occurring disorders
  • Severe substance use disorders
  • High need for services and support
  • Deserving of multi-system braided funding!
Cumulative Observations (2)

• Most programs studied appear to be successful in supporting young people in recovery, and providing (at least transitional) academic services

• Substance use outcomes are very positive based on rigorous quasi-experimental analysis using propensity scoring to equate groups.

• Academic outcomes show promise but effects are small

• Mental Health Outcomes show similar reductions in symptomatology in RHS and comparison group
Cumulative Observations (3)

• Adding more counselors with mental health certification may help better address the co-occurring disorders faced by the majority of RHS students.

• RHSs should consider providing more needed family supports by providing linkages to evidence based family services, either in the school or in the community.

• Should consider structural changes that might reduce racial and socioeconomic status disparities both in RHSs and in the general treatment and continuing care field.
The Heaviness of Now

- **COVID Impact:**
  - Diminished enrollments
  - Mental health and substance misuse crisis
  - Recessions led to cuts in local funding for small, speciality programs (2008 to 2013 example)
“This school saved my life”

“Whether stated figuratively or literally, multiple students in multiple sites expressed the life-sustaining nature of these programs. After extensive study and consideration, we believe that without these programs, dozens of our state’s young people would be substantially worse off both in terms of their academic and their recovery progress.”

- From An Evaluation of Massachusetts Recovery High School Programs (Mazur & Brody, 2020)