

NC Department of Health and Human Services

Opioid and Prescription Drug Abuse Advisory Committee (OPDAAC)

Topic: Prevention, Early Intervention,
Treatment, and Recovery for Youth and
Adolescents

September 19, 2025

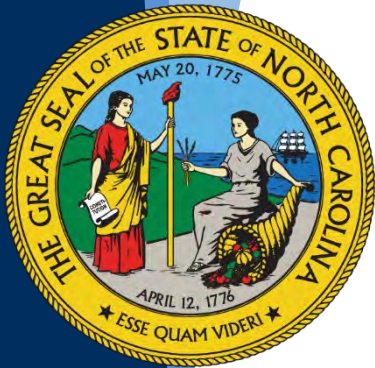


Housekeeping

- *Take breaks as needed*
- For questions during the meeting:
 - o Please put your questions in the Q&A box, which will be monitored for the duration of the meeting. **Note:** you need to send to all panelists and attendees to ensure your question is addressed in a timely manner.
- For questions after the meeting, please email beinjuryfreenc@dhhs.nc.gov.

Welcome and Introductions

- Tyler Yates, Division of Mental Health, Developmental Disabilities, Substance Use Services



NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

Comparison of Preadolescent and Adolescent Fentanyl-Positive Deaths, 2015-2024

Meredith Welch, MPH
Applied Forensics Epidemiologist

Division of Public Health
Office of the Chief Medical Examiner



Agenda

- Background
- Overall Fentanyl-Positive Death Trends
- Pediatric Fentanyl-Positive Death Trends
- Case Examples
- Prevention Strategies
- Resources
- Wrap Up

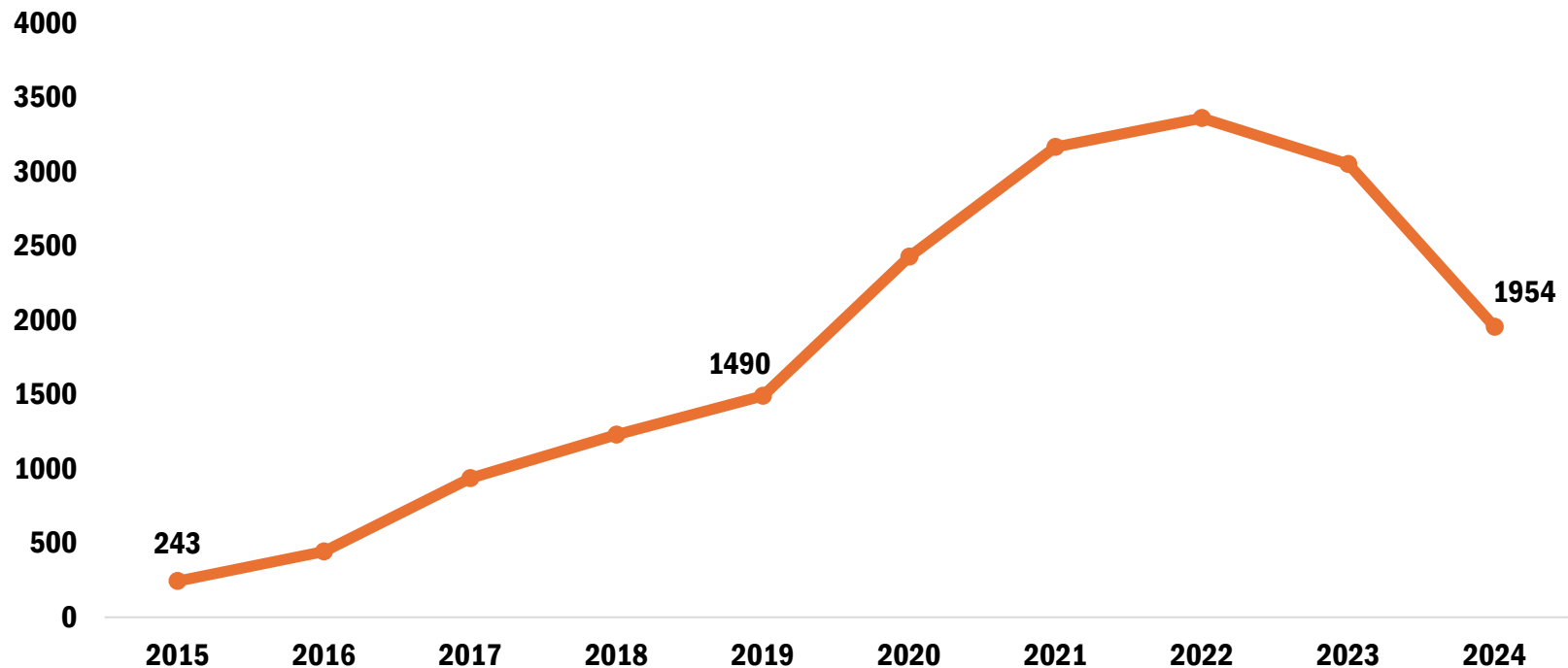
Fentanyl-Positive Deaths Technical Note

- Data are based on analytical testing of specimens performed by NC OCME Toxicology.
- The detection of fentanyl by the laboratory may not necessarily be the ultimate cause of death as determined by the pathologist.
 - For instance, in rare cases, therapeutic fentanyl administered during emergency medical care will show up as a fentanyl-positive death.
- Data are presented in numbers and rates, with rates enabling standardized comparisons across populations and time periods.
- Please note that while fentanyl is a major contributor to pediatric overdose deaths, other substances remain risks to this population.

Overall Fentanyl- Positive Deaths

In North Carolina, fentanyl-positive deaths have increased by 31% since the start of the pandemic (2019), reaching a total of 1,954 cases in 2024

Number of Fentanyl-Positive Deaths by Year, MEIS, 2015-2024*



Limited to deaths that occurred in NC

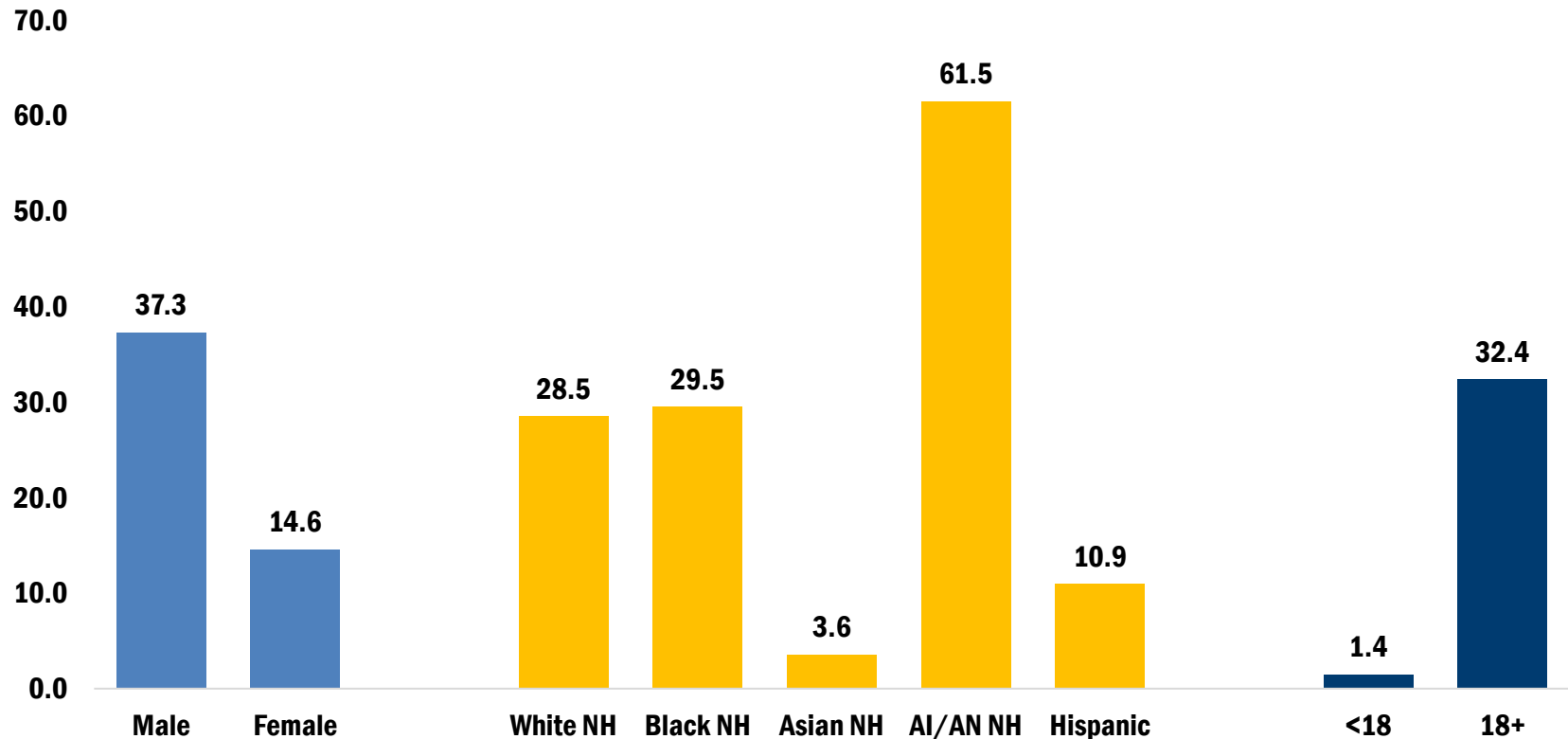
*2024 data are provisional

Source: MEIS, 2015-2024

Analysis by the OCME Data and Information Unit

Males and American Indian residents experienced the highest rates of fentanyl-positive deaths in NC

Fentanyl-Positive Death Rates (per 100,000) by Demographic Group, MEIS, 2021-2024*



Limited to NC residents; NH = Non-Hispanic; AI/AN = American Indian/Alaskan Native

*2024 data are provisional

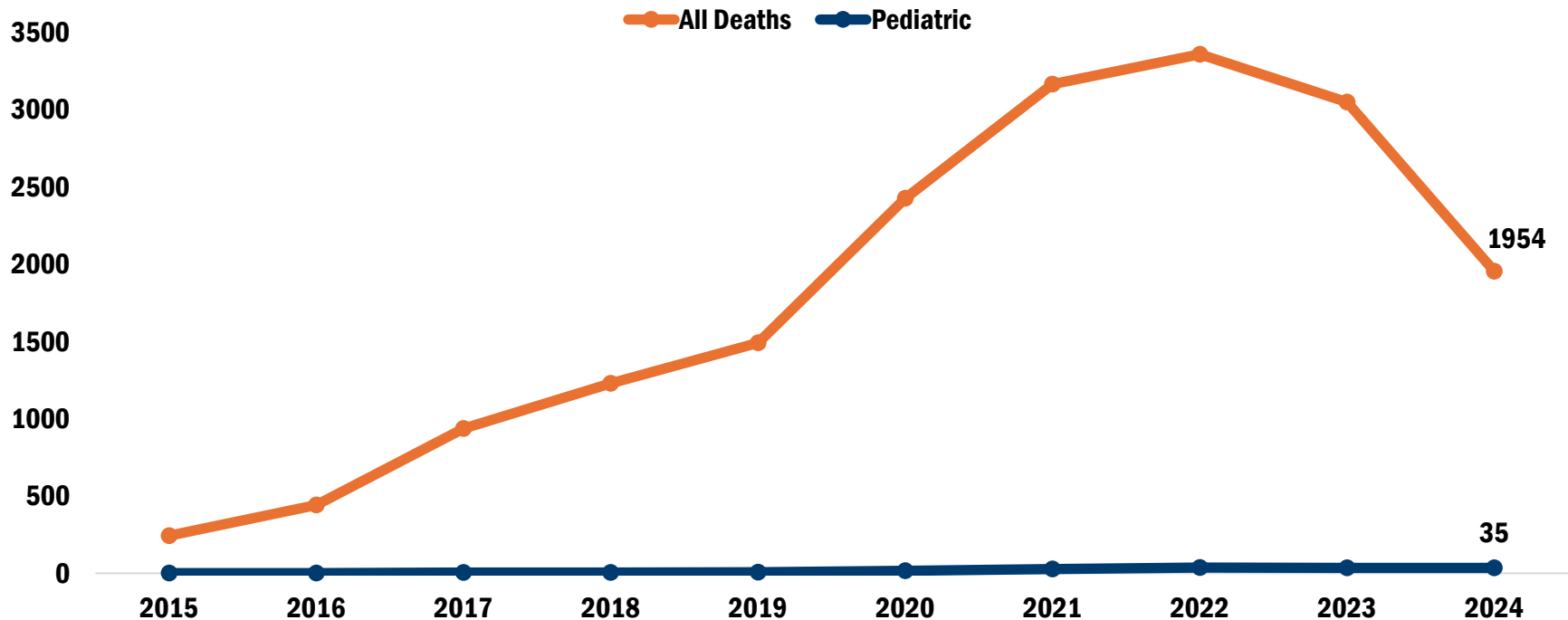
Source: MEIS, 2021-2024; US Census non-bridged population estimates, 2021-2024

Analysis by the OCME Data and Information Unit

Pediatric Fentanyl- Positive Deaths

In 2024, pediatric fentanyl-positive deaths accounted for 1.8% of all fentanyl-positive deaths

Number of Pediatric Fentanyl-Positive Deaths by Age Group, MEIS, 2015-2024*



Limited to deaths that occurred in NC

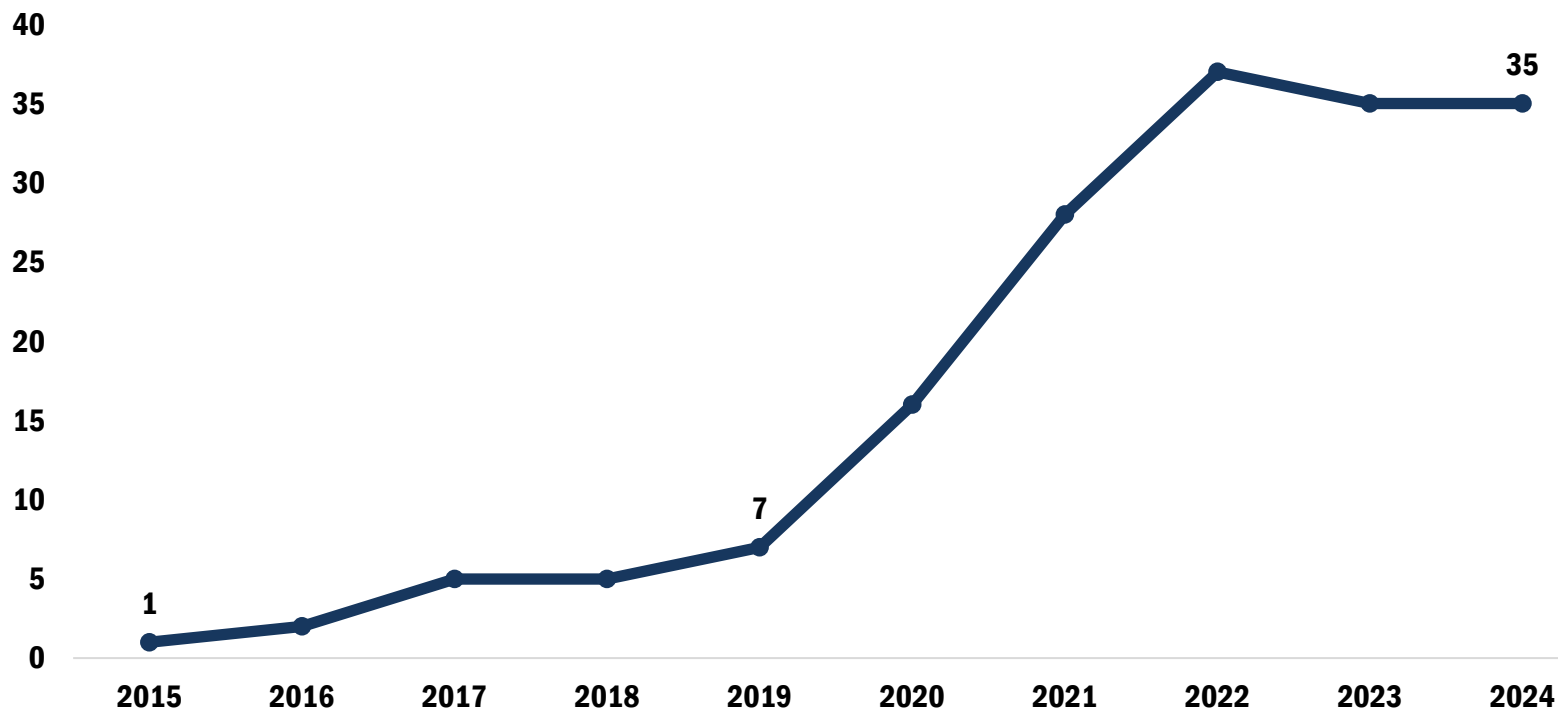
*2024 data are provisional

Source: MEIS, 2015-2024

Analysis by the OCME Data and Information Unit

In North Carolina, pediatric fentanyl-positive deaths have increased by 400% since the start of the pandemic (2019), with 35 cases in 2024

Number of Pediatric Fentanyl-Positive Deaths by Year, MEIS, 2015-2024*



Limited to NC residents

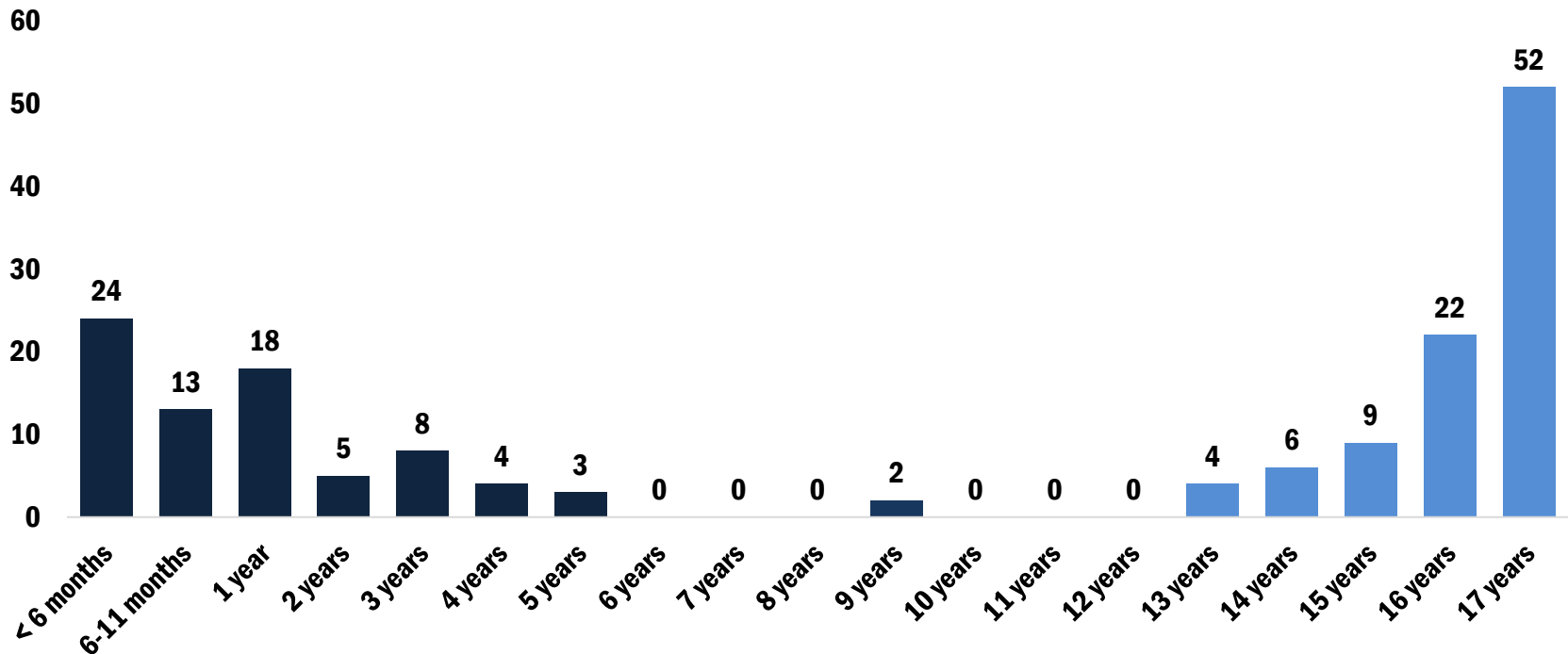
*2024 data are provisional

Source: MEIS, 2015-2024

Analysis by the OCME Data and Information Unit

Infant/toddlers (0-5) and teenagers (13-17) have the highest counts of pediatric fentanyl-positive deaths

Number of Pediatric Fentanyl-Positive Deaths by Age Group, MEIS, 2015-2024*



Limited to NC residents

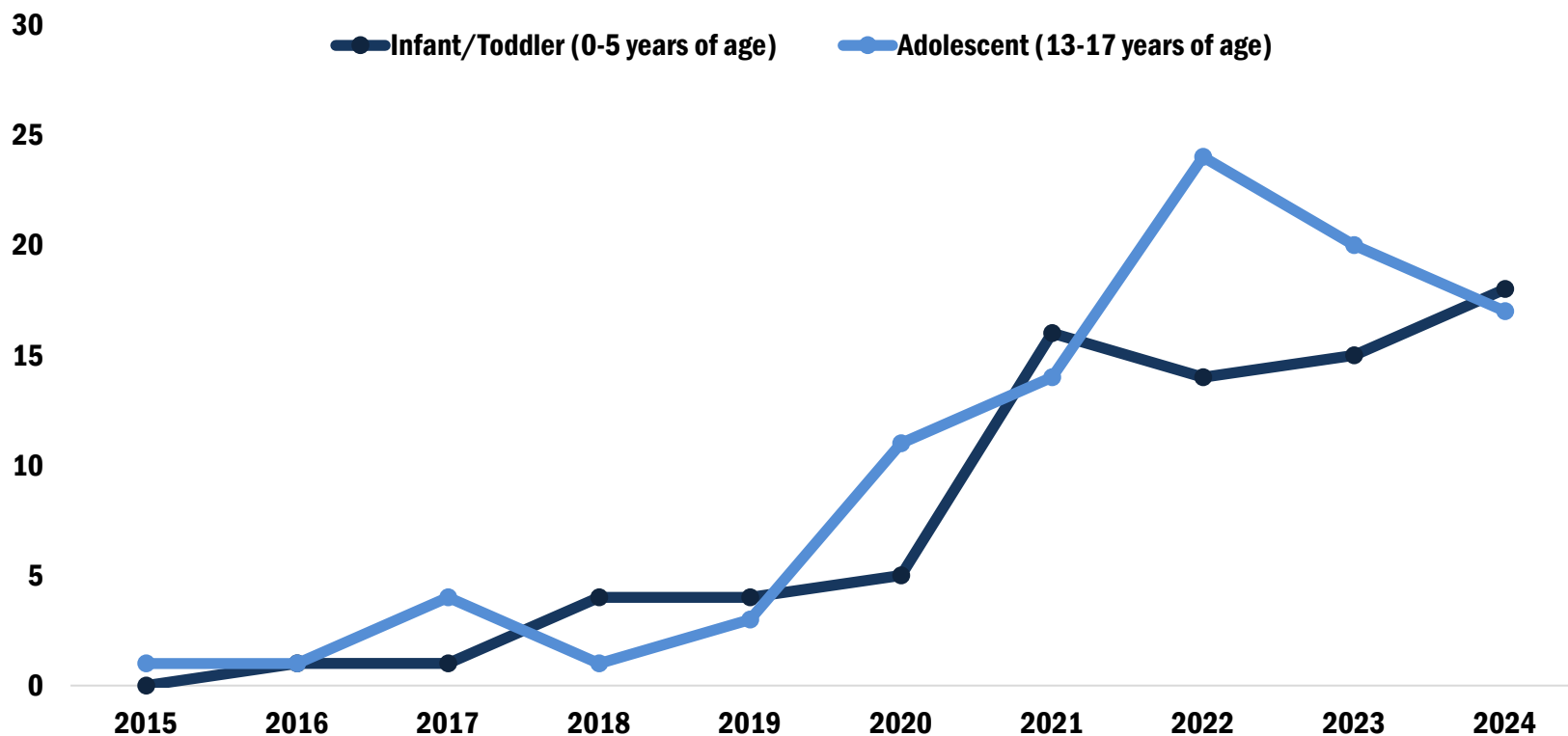
*2024 data are provisional

Source: MEIS, 2015-2024

Analysis by the OCME Data and Information Unit

Fentanyl-positive deaths have increased in both infants/toddlers and adolescents over the past 10 years

Number of Pediatric Fentanyl-Positive Deaths by Age Group and Year, MEIS, 2015-2024*



Limited to NC residents

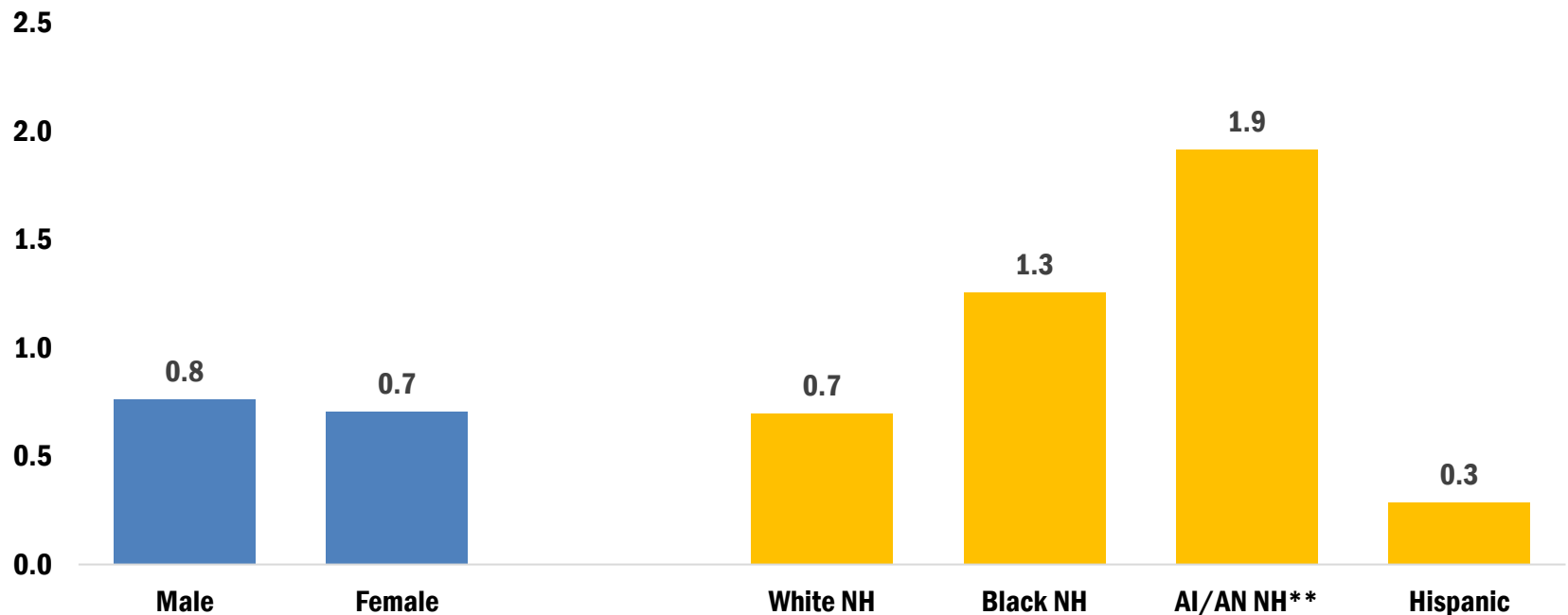
*2024 data are provisional

Source: MEIS, 2015-2024

Analysis by the OCME Data and Information Unit

American Indian and Black residents experienced the highest rates of pediatric fentanyl-positive deaths in NC

Pediatric Fentanyl-Positive Death Rates (per 100,000) by Demographic Group, MEIS, 2015-2024*



Limited to NC residents; NH = non-Hispanic; AI/AN = American Indian/Alaskan Native

*2024 data are provisional

Source: MEIS, 2015-2024; US Census non-bridged population estimates, 2015-2024

Analysis by the OCME Data and Information Unit

Rate calculations could not be supported for NH Asian

**Interpret rate calculation for NH AI/AN with caution (n=5)

Case Examples

Case Examples

“Grandmother took the decedent (10 months) to a babysitter’s house, law enforcement found drugs in babysitter’s pocketbook.”

“The decedent (1 year) was co-sleeping in bed with mother. The mother stated she used a cotton ball of fentanyl and left the rest beside the bed.”

“The decedent (17 years) was reportedly abusing Percocet and Xanax before being put to bed.”

“The decedent (16 years) was at a party at which he apparently ingested pills believed to be Xanax.”

Prevention Strategies

Summary and Prevention: Infant/Toddler

- **Key Takeaways:**

- Fentanyl powders/residue are much easier for a child to ingest than prescription opioid pills.
- Leftover paraphernalia will contain enough potent drug to be potentially lethal to a small child.
- Unsafe environments, especially adult sleeping spaces that contain paraphernalia will increase the dangers surrounding fentanyl overdoses.

- **Prevention:**

- Caregivers must be better informed about risks drug paraphernalia can pose to children
- Infants/Toddlers (0-5) need a safe environment
 - **Drug Safe Storage:** Exploring children may access unsecured prescription and recreational drugs. We have observed this occurring in unsafe sleep environments where leftover paraphernalia is present.

Summary and Prevention: Tweens/Teens

- **Key Takeaways:**

- There is a growing trend of counterfeit pills, both opioids and benzodiazepines, often taken unknowingly laced with fentanyl.

- **Prevention:**

- Research consistently shows that drug prevention for teens must begin early, often before they reach adolescence.
- Adolescents and parents must engage in prevention efforts by:
 - Reducing peer and academic pressures that contribute to substance use
 - Promoting awareness of long-term consequences
 - Ensuring timely access to treatment

Resources

Fentanyl-Positive Deaths Data Products

Monthly Reports

Fentanyl-Positive Deaths, North Carolina Office of the Chief Medical Examiner (OCME) Toxicology Data: June 2025*

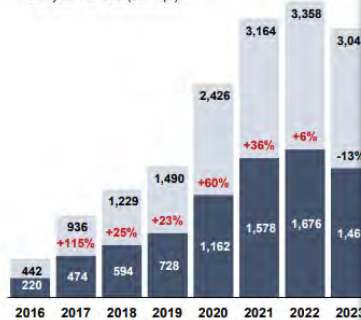
136 Fentanyl-Positive Deaths
June 2025* compared
168 in June 2024

*Results are based on analytical testing of specimens performed by the North Carolina Office of the Chief Medical Examiner (OCME) Toxicology. The detection of fentanyl by the laboratory may not be the ultimate cause of death as determined by the pathologist.

Year to year: Fentanyl-Positive deaths are down compared to this time last year.

Percent change is YTD total compare to this time last year.

■ Full year ■ YTD (Jan-Apr)



NC Office of the Chief Medical Examiner (OCME)

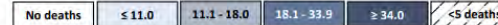
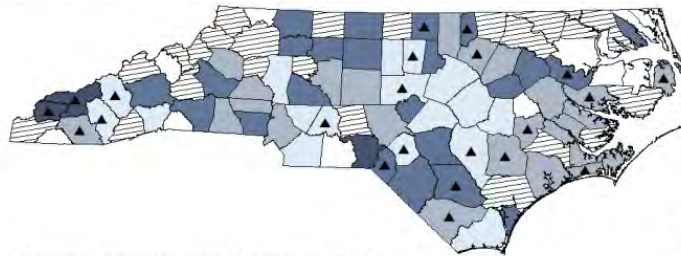
Month to month: From May '25 to Jun '25 deaths decreased 1%.

Counts may fluctuate month-to-month. Please reference YTD percent change for overall.

Counties with the highest fentanyl-positive death rates are spread throughout the state.

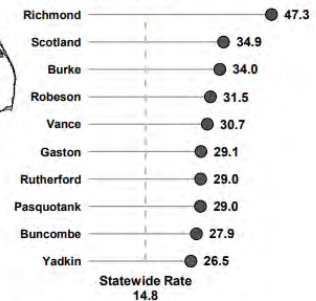
Rates calculated for last 12 months, May '24 - Jun '25.

Rate per 100,000 residents.



Counties with the 10 highest rates of fentanyl-positive death rates.

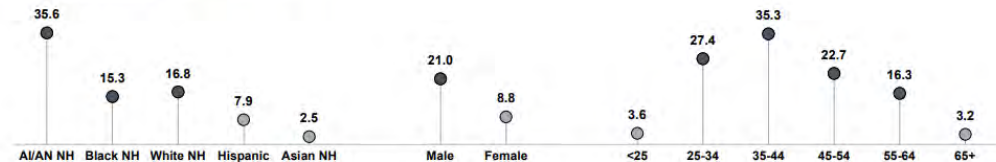
Rates calculated for last 12 months, May '24 - Jun '25. Rate per 100,000 residents.



Residents who are Native American, Black, white, male, ages 25-64 had a higher rate of fentanyl-positive deaths compared to the statewide rate of 14.8.

Rates calculated for last 12 months, May '24 - Jun '25.

Rate per 100,000 residents.



NH (Non-Hispanic);
AI/AN (American Indian/Alaskan Native)

*Categories are not mutually exclusive. Prescription drugs are defined as benzodiazepines and gabapentin/pregabalin. Fentanyl alone indicates that alcohol, cocaine, prescription drugs (benzodiazepines and gabapentin/pregabalin), methamphetamine, and other opioids were not present.

Data Sources: Toxicology Data—NC OCME Toxicology; Demographic Data—OCME medical examiner system; Population Data—U.S. Census Bureau, <http://quickfacts.census.gov>

*2024-2025 data are considered provisional and should not be considered final.

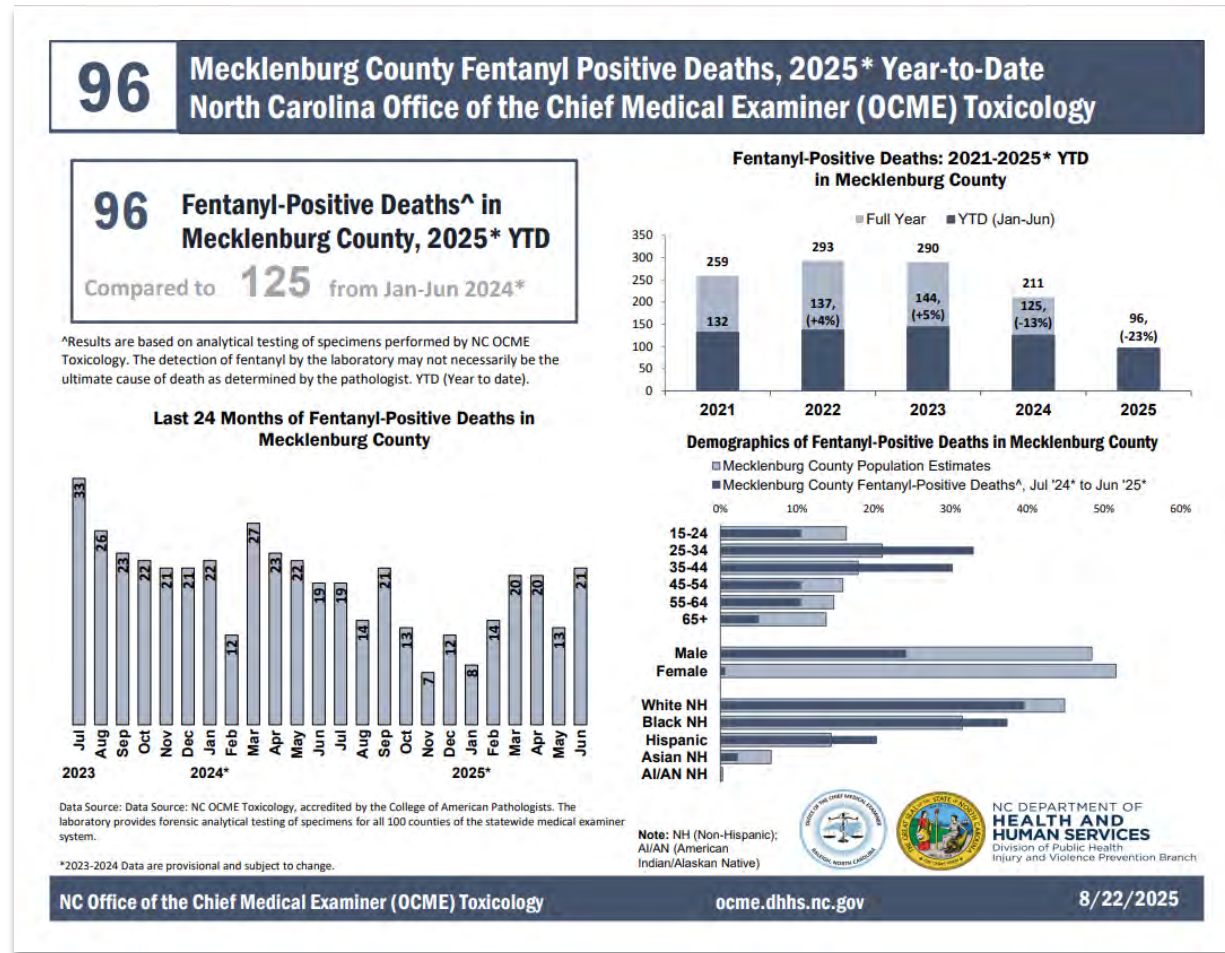
NC Office of the Chief Medical Examiner (OCME) Toxicology

ocme.dhhs.nc.gov

8/25/2025

County Fentanyl-Positive Deaths Data Products

Monthly Reports



To receive email updates of these reports, email: substanceusedata@dhhs.nc.gov

Access more information on pediatric opioid



| Pathology/ Biology

Pediatric opioid fatalities: What can we learn for prevention?

Sandra C. Bishop-Freeman PhD, Kerry A. Young MS, Michelle B. Aurelius MD, Jason S. Hudson PhD

Journal of Forensic Sciences | First Published: 23 April 2021

JOURNAL OF
FORENSIC SCIENCES

2021 Noteworthy Articles



Additional resources on counterfeit pills

Suspected North Carolina counterfeit pill-involved deaths, 2020-2022



OCME and Injury and Violence Prevention Branch Counterfeit Pills Factsheet

Know What's in Your Drugs COUNTERFEIT PILLS

AUTHENTIC
oxycodone
N30 tablets

FAKE*
oxycodone N30 tablets
containing fentanyl

>>> **CLICK HERE** for real examples of authentic and fake pills.

WHAT are counterfeit pills?

Counterfeit pills are fake medications that have different ingredients than the actual medication. Even if a pill "looks" correct, if purchased illicitly, it still may be counterfeit.

Many fake pills are made to look like prescription opioids or stimulants and contain no legitimate medication.

Prescription pills purchased outside of a licensed pharmacy are illegal, dangerous, and potentially lethal. Nationally, evidence of counterfeit pill use in overdose deaths has more than doubled in recent years. These fake pills have been increasingly easy to purchase, with sales taking to the internet and social media.

In 2023, **7 out of 10** DEA-tested fentanyl-laced counterfeit pills contained a **potentially lethal dose of fentanyl**.

*Source: United States Drug Enforcement Administration. CDC. [NIFW: Drug Overdose Deaths with Evidence of Counterfeit Pill Use](#)

Counterfeit pills in NORTH CAROLINA

In North Carolina, nearly **77,000** counterfeit pills were seized in 2021, **80%** of which contained some amount of fentanyl.

In a 2020-2022 study completed by the [North Carolina Office of the Chief Medical Examiner \(NC OCME\)](#), the postmortem toxicology results of a sample of 75 decedents were compared to the substances the investigation findings indicated that decedents thought they were taking.

Of the 75 decedents, investigation findings indicated that **38 (50.7%)** thought they were taking Xanax and **41 (54.7%)** thought they were taking a form of oxycodone. Toxicology reports found **zero** reportable traces of either drug.

Toxicology findings were most often **positive for fentanyl** and designer benzodiazepines.

This study highlights real examples of overdose deaths involving counterfeit pills in North Carolina. Decedents were most often male (60%), under 40 years old (74.7%), and white (68%). **80%** of decedents in this study tested **positive for fentanyl** and 1 in 3 deaths had a direct witness testimony, indicating an opportunity for naloxone administration or other intervention.

Source: [NC Health Services Data Tracking Areas & NC OCME](#). *Total adds to more than 100% as many decedents had more than one substance in their system.

STRATEGIES TO PROMOTE HARM REDUCTION and Prevent Counterfeit Pill Overdoses

1. Equip Syringe Service Programs (SSPs) with drug checking equipment such as fentanyl test strips and infrared spectrometry, and supply with educational handouts on how to correctly test pills, specifically.
2. Support drug checking, and educate individuals on the [Drug Testing Equipment Exception to Paraphernalia Law](#).
3. Fund SSPs to provide naloxone along side fentanyl test strips.
4. Promote the Never Use Alone hotline (1-800-484-3731), and educate individuals on the [Good Samaritan Law](#).
5. Expand SSP locations or other agencies providing harm reduction services to ensure there is a resource hub available in every county.
6. Encourage collaboration of public health, public safety, and harm reduction experts for surveillance and prevention of counterfeit pill-involved overdoses.

The NC Department of Health and Human Services (NCDHHS) generates multiple resources to help keep our partners informed about overdose in North Carolina. **To see data and other resources, including information about NC's response efforts, please visit [NC DHHS Overdose Epidemic](#).**

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<https://www.dhhs.ncdhhs.gov/> • NCDHHS is an equal opportunity employer and provider. • 10/2023

Thank You!

Dr. Sandra Bishop-Freeman, OCME Tox

Laura Friederich, OCME Tox

Mary Beth Cox, IVPB

Additional Questions?

meredith.welch@dhhs.nc.gov

Overview of Prevention in North Carolina

- Jessica Dicken, Division of Mental Health, Developmental Disabilities, Substance Use Services

Key Distinctions in Prevention:

- **Primary Prevention:** Programs, policies, and services designed to prevent or delay substance use or misuse **before** it occurs. Serves individuals/communities as well as those at risk for substance misuse
- **Opioid Overdose Prevention:** Services to educate/prevent and reverse opioid overdose and prevent death

Opioid Use Often Begins Early

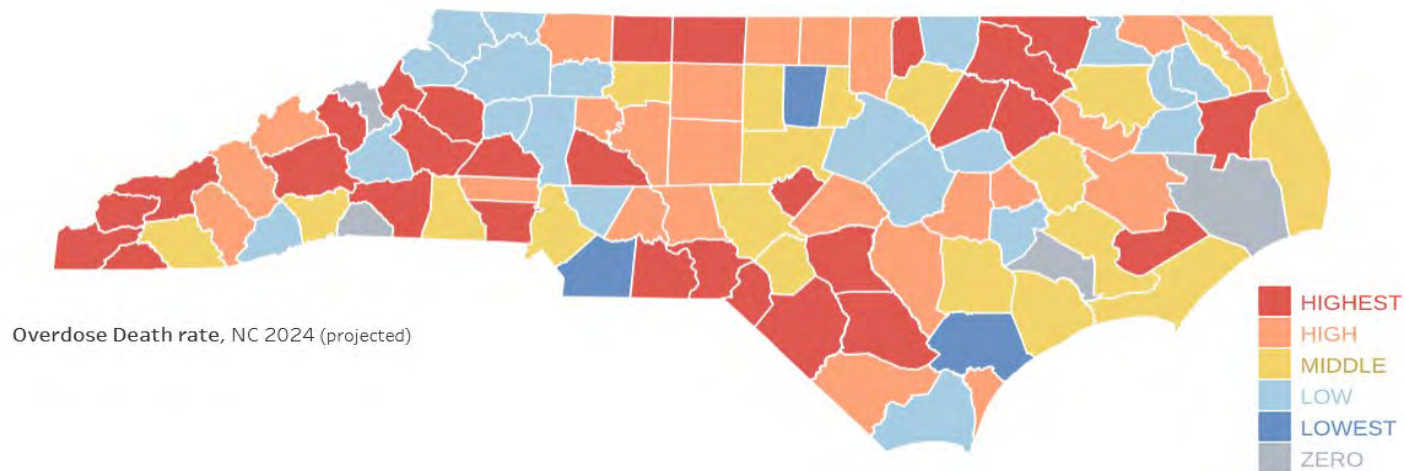
- Many opioid use disorders (OUD) start with earlier substance use behaviors, especially:
- Prescription misuse (e.g., from sports injuries, dental surgery, etc.)
- Polysubstance use in adolescence (alcohol, nicotine, cannabis)
- Untreated mental health or trauma exposure

NC's Cost of the Opioid Epidemic

- 2022: \$49 billion
- 2023: \$50 billion
- *Medical, social, and personal costs of overdose deaths

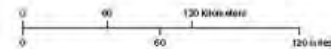
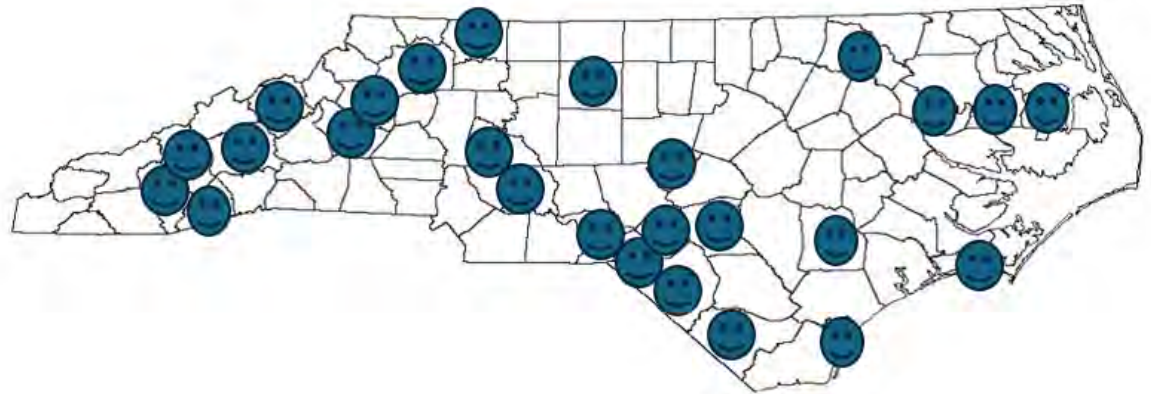
Source: CDC.gov

Overdose Death Rate NC (2024)



Source: NCDHHS Division of Public Health

North Carolina Opioid Prevention Funded Areas



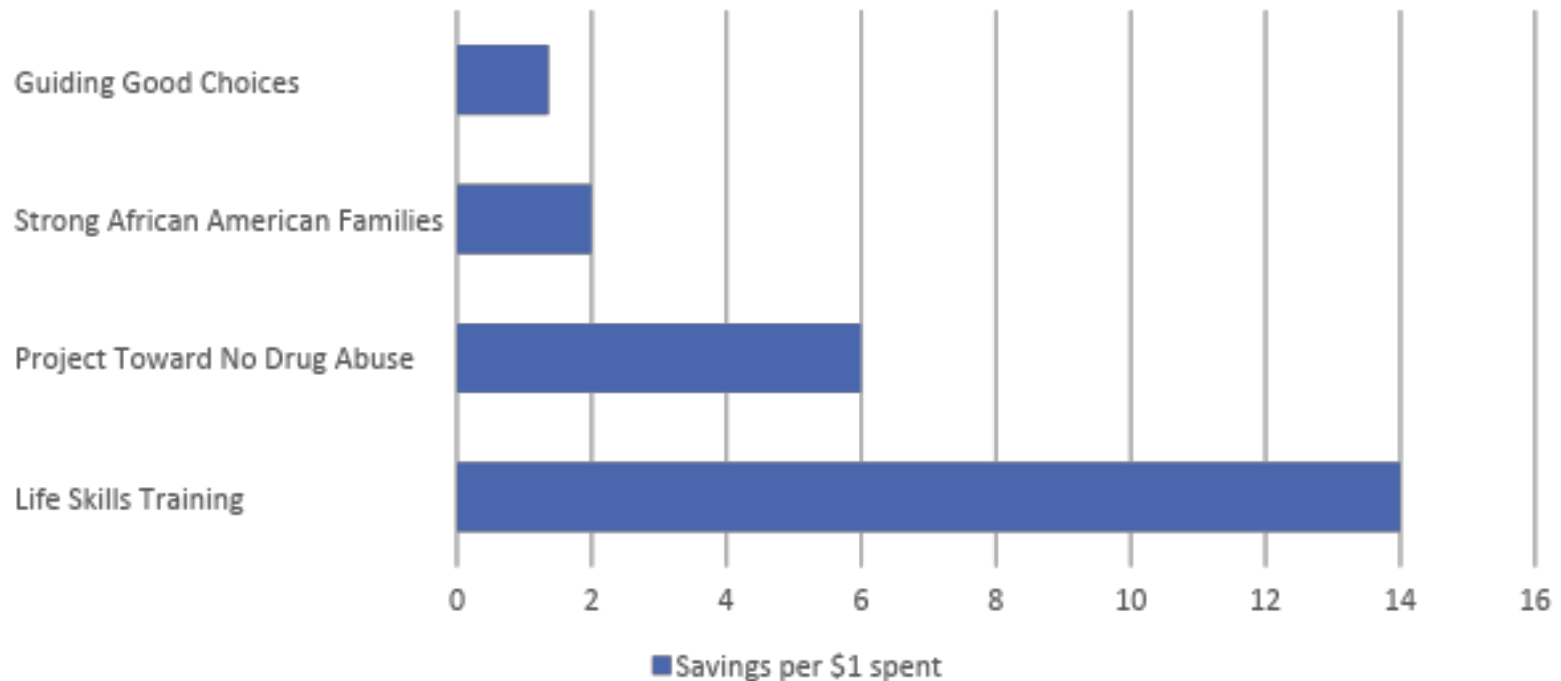
- ★ 11 PDO counties
- ★ 7 SPF-PFS counties
- ★ 7 SPF-Rx counties
- ★ 10 SOR education counties
- ★ 10 SOR statewide counties

Primary Prevention Saves Money

- Medication-Assisted Treatment (MAT): ~\$6,500–\$14,000/year per person
- Overdose Prevention Centers: ~\$1M/year to operate
- Criminal justice + lost productivity: ~\$700K per OUD case/year
- By contrast:
- Prevention programs average \$200–\$1,500 per participant

Source: ChatGPT

Cost Savings of Evidence-Based Primary Prevention



Source: Central East PTTC September 26, 2024

Investment in Primary Prevention

- Since 2021, DMHDDSUS has invested **\$12.4 million** in opioid primary prevention initiatives and one opioid overdose prevention grant

Investment in Primary Prevention

Youth Prevention Education (YPE) programs were implemented with **459 new groups of participants** that served close to **9,000 individuals during the year**.

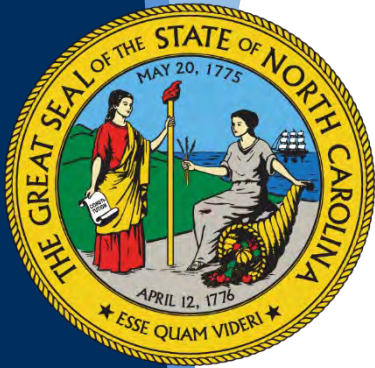
The **Lock Your Meds (LYM)** communication campaign reached residents across the state and coincided with **over 11,000 lock boxes** and more than **15,000 medication disposal kits** distributed.

Prevention providers participated in over **200 medication take-back events** where more than **1,200 pounds of unused medication** were collected.

One of the most **significant prevention successes** prevention providers identified was **increasing community awareness of secure medication storage and safe disposal information**.

Presenting today:

- Preventing Drug Overdose (PDO) [Jane Casarez]
- Community Impact North Carolina (CINC):
 - Lock Your Meds
 - State Opioid Response (SOR) Community Collaborations
- SPF-Rx (Kristen Hunt)
- Partnerships for Success (PFS)
- Pivot Point (Matthew Nannis)
- PATH (Jessica Zucchini and Schell McCall)
- Insight Human Services, Surry Co. (Regina Propst)
- Coastal Horizons, New Hanover Co. (Deeanna Hale-Holland)
- Rx and Opioid Prevention data/information provided by Wake Forest School of Medicine and PIRE



NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

Preventing Drug Overdose Grant (PDO)

Jane Casarez

Grants to Prevent Prescription Drug/Opioid Overdose-Related Deaths

- SAMHSA grant awarded to the state of North Carolina
- Selected 11 communities to receive \$50,000 per year for 5 years through a competitive RFA process
- All subrecipients are historically primary prevention providers



Required and Allowable Strategies

Required

- Naloxone distribution
- Naloxone training

Allowable

- Prescriber and Dispenser Education/Training
- NC LYM Campaign
- Paramedicine
- Linkages to treatment/recovery services

Implementation Highlights

36,226	3,709	1,183
Total # of naloxone kits distributed using PDO funds to date: • Maintaining a distribution level of as many as 15,000 kits annually	Total # of reported naloxone administration events to date	Total # of unduplicated overdose victims and families who received information about and referrals to treatment services

Implementation Highlights

761	3,698	6,203	5,891
Total # of Professionals First Responders trained to date on overdose recognition and naloxone administration:	Total # of Lay Persons, Community Organizations, and Government Agencies trained to date on overdose recognition and naloxone administration	Total # of medication lockboxes distributed to date	Total # of chemical medication disposal kits distributed to date: 5,891

PDO County Grantee Interview Findings

Collaborations with community partners are instrumental in reaching populations at risk for overdose and those who work with them:

- Local non-profits (e.g., shelters, treatment centers, food pantries), EMS, religious organizations, and colleges.
- Key strategies for building new partnerships include connecting with partners through coalition meetings and connecting with new partners through current partners.

Naloxone Education:

- Approach naloxone education outside of the box (e.g., expanding outreach beyond existing partnerships);
- Maintain persistence and timely follow-up and frame information dissemination appropriately for the audience.

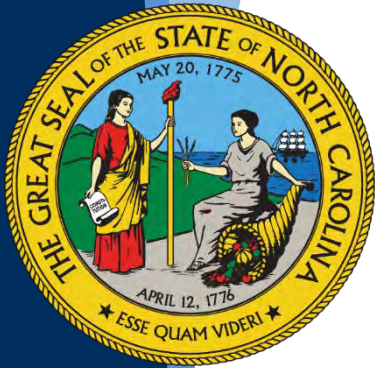
PDO County Grantee Interview Findings continued

Naloxone Distribution and Access:

- Community access points for naloxone via the project include vending machines and community supply closets/“Blessing Boxes” (i.e., boxes placed in agencies and churches).
- Key strategies for continuing successful naloxone distribution efforts include anti-stigma messaging and the support of reliable partnerships.

Treatment Referrals:

- Use of community partnerships is a key support for connecting individuals with treatment services.
- Peer Support Specialists accompanying EMS on overdose calls are also helpful in connecting individuals to treatment.



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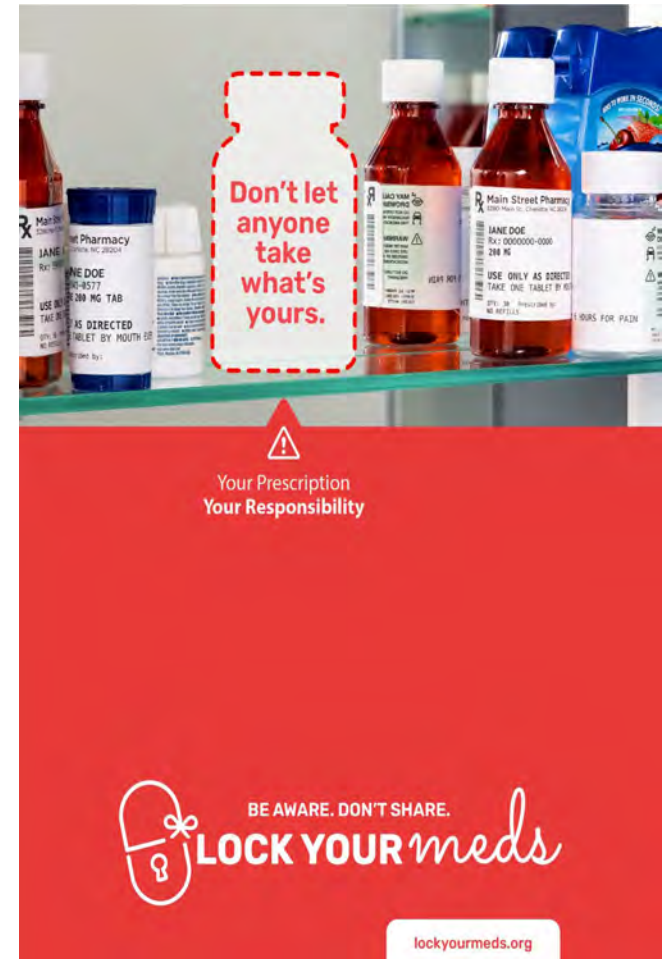
Lock Your Meds Campaign

Holly Carter and Erin Day

Lock Your Meds Communication Campaign

Lock Your Meds® is a national multimedia campaign, produced by National Family Partnership®, designed to reduce prescription drug misuse by changing storage and disposal behaviors around prescription medications.

- CINC has been administered under license agreement since 2017, with support from NCDHHS, Division of Mental Health, Developmental Disabilities, and Substance Abuse Services, with SAMSHA funding
- License use is open to all 100 NC Counties
- Approximately 90 Counties implement at different levels



Permission has been granted for the use of the Lock Your Meds Campaign images.

Strategies and Examples

Information Dissemination:

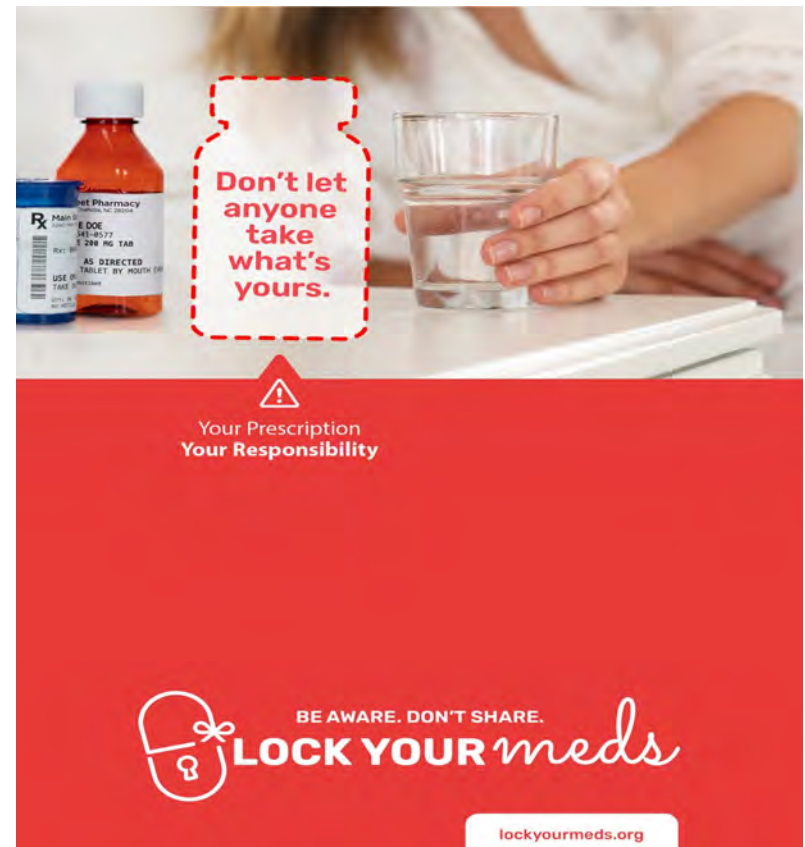
- PSA's (TV, OTT, Radio, Digital)
- Social Media
- Rack Cards / Pamphlets
- Billboards

Community-Based Processes:

- Community Trainings
- Planning efforts
- Collaborations

Environmental:

- Policies / Procedures / Practices
- Reducing Barriers (points of contact for resources)
- Reduced Access (permanent drop boxes, Locking medicine cases, at home disposal kits)
- Changing Social Norms



Permission has been granted for the use of the Lock Your Meds Campaign images.

Statewide Success Since 2017



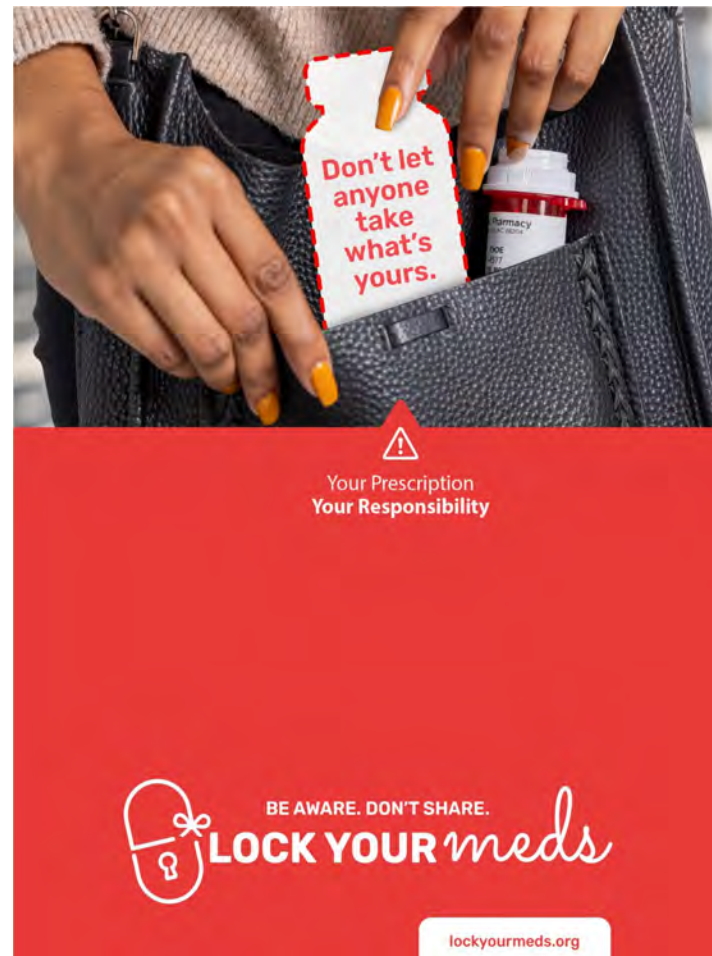
Permission has been granted for the use of the Lock Your Meds Campaign images.

- Under multiple grants and funding combined:
- Over **275,000** locking medicine cases distributed
- Over **275,000** at-home disposal kits distributed
- Over **1,000** medication take-back events to enhance LYM efforts
- Over **575,000** printed campaign materials
- Approximately **70** permanent medication disposal boxes placed/installed through LYM efforts
- Over **75 million** impressions recorded

Evaluations and Outcomes

- PIRE conducted statewide surveys in 2020, 2022 and 2024 to evaluate the effectiveness
- 2021 PIRE Focus Groups to obtain input from providers and community members
- 2021 CINC collaborated w/ NFP to update the campaign for NC based on findings
- Concluded significant success in changing behaviors and attitudes

<https://www.lockyourmeds.org/nc/>



Permission has been granted for the use of the Lock Your Meds Campaign images.

Lock Your Meds Data from the 2024 NC Secure Medication Storage Statewide Survey



42% of the respondents who recalled seeing the Lock Your Meds campaign messages indicated that the campaign influenced them to **lock up their medications.**



25% of the respondents who recalled seeing campaign messages indicated that the campaign influenced them to **regularly check their medications to see if anything is missing.**

Summative Results from the NC Secure Medication Storage Statewide Survey from 2020, 2022, and 2024



Those familiar with the campaign were over **2.5 times more likely than others** to report using a lock box to store medications in their home.



Those familiar with the campaign were almost **twice as likely as others** to report using desired disposal methods (i.e., drop box, take-back event, or disposal kit).

NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

SPF-Rx Impacts and Scorecards

Kristen Hunt and Jessica Edwards



SPF-Rx Overview

The purpose of the SAMHSA-funded SPF Rx program is to provide resources to address prescription drug misuse by:

- Raising awareness about the dangers of sharing medication, secure storage, and safe disposal options
- Increasing CSRS utilization and reducing overprescribing

The SPF-Rx initiative in NC supports opioid prevention in 7 counties with elevated prescription risks.

Goal-Oriented Impact (By 2026):

- +10% increase in prescriber training
- +10% Prescription Drug Monitoring Program (PDMP) utilization
- (NC Controlled Substances Reporting System)
- -10% high-risk prescribing in young adults
- +10% increase in secure storage & disposal



Turning SPF-RX Data Into Prevention Insights - Scorecards

Wake Forest University School of Medicine develops scorecards that SPF-RX communities use to:

- Visualize the scope of the problem
- Provide guidance for preventing Rx medication misuse tailored to the audience:
 - Personal actions, drop box locations, and other resources for community members
 - CSRS utilization, patient education, and naloxone co-prescribing information for health care providers

Data for the scorecards comes from:

- Death data, North Carolina State Center for Health Statistics, Vital Statistics Death Certificate Data
- North Carolina Controlled Substance Reporting System

Prescription Opioid Use in Columbus County



Steps to Reduce Prescription Opioid Misuse and Overdose



Talk with your health provider about alternatives to prescription opioids for pain management, such as physical therapy, exercise, nonopioid medications (acetaminophen (Tylenol®) or ibuprofen (Advil®)), Cognitive Behavioral Therapy (CBT), interventional therapies like injections, weight loss, acupuncture, or massage.



If a prescription opioid is recommended, ask your healthcare provider to prescribe the lowest effective dose. Also ask if they would recommend Naloxone, an opioid overdose reversal medication.



Avoid taking opioids with alcohol and other substances, especially those that cause drowsiness, such as benzodiazepines (Xanax®, Valium®), muscle relaxants (Soma®, Flexeril®), sleep aids (Ambian®, Lunesta®), or other prescription opioids.



Keep prescription medications locked and safely secured within the home through a lockbox, safe, or by simply locking your medicine cabinet.



Don't share your medications with family members and/or friends. Take all medications as prescribed by your healthcare provider.



Drop off your expired and/or unused medication safely and anonymously at one of your local prescription drug drop box locations.

Local Prescription Drug Drop Box locations:



Chadbourn Police Department
402 N Brown St
Chadbourn, NC 28431
Phone: 910-654-4146



Columbus Regional Hospital
500 Jefferson St
Whiteville, NC 28472
Phone: 910-642-8011



Columbus County Sheriff's Office
805 Washington St
Whiteville, NC 28472
Phone: 910-642-6551



Tabor City Police Department
1108 E 5th St
Tabor City, NC 28463
Phone: 910-653-3149



Contact the Robeson Health Care Corporation at 910-521-2900 to learn more about secure medication storage, safe medication disposal, and how you can get involved in preventing opioid misuse and overdose.

Additional Resources

- Lock Your Meds North Carolina: lockyourmeds.org/nc
- Centers for Disease Control and Prevention Opioid Prescribing Information for Patients: cdc.gov/drugoverdose/patients

Healthcare Provider Steps to Reduce Prescription Opioid Misuse and Overdose

1

Register for and use the North Carolina Controlled Substances Reporting System (CSRS).

- NC Controlled Substances Reporting System
www.ncdhhs.gov/divisions/mental-health-developmental-disabilities-and-substance-abuse/north-carolina-drug-control-unit/nc-controlled-substances-reporting-system

2

Integrate the CSRS into your Electronic Health Records.

- NC Controlled Substances Reporting System Integration Resources
www.ncdhhs.gov/divisions/mental-health-developmental-disabilities-and-substance-abuse/north-carolina-drug-control-unit/nc-controlled-substances-reporting-system-integration-resources

3

Engage in prescriber and patient education to increase the use of safer, more effective pain treatments, including alternatives to opioid analgesics.

- CDC's Safer Opioid Prescribing Infographic:
www.cdc.gov/vitalsigns/opioids/infographic.html#infographic
- CDC's 2022 Clinical Practice Guideline for Prescribing Opioids for Pain:
www.cdc.gov/opioids/health-care-professionals/prescribing/guideline

4

Learn more about Naloxone and overdose risk factors, and consider whether you should offer Naloxone to patients prescribed opioids.

- CDC Naloxone trainings:
www.cdc.gov/opioids/naloxone/training/index.html
- CDC guidance on when to offer Naloxone to patients:
www.cdc.gov/opioids/naloxone/factsheets/pdf/naloxone_factsheet_healthcare_providers.pdf

For additional data on the opioid epidemic go to the NC Opioid And Substance Use Action Plan Data Dashboard:

www.ncdhhs.gov/opioid-and-substance-use-action-plan-data-dashboard

Turning SPF-RX Data Into Prevention Insights – CSRS Utilization & Rx Dispensation Trend Reports

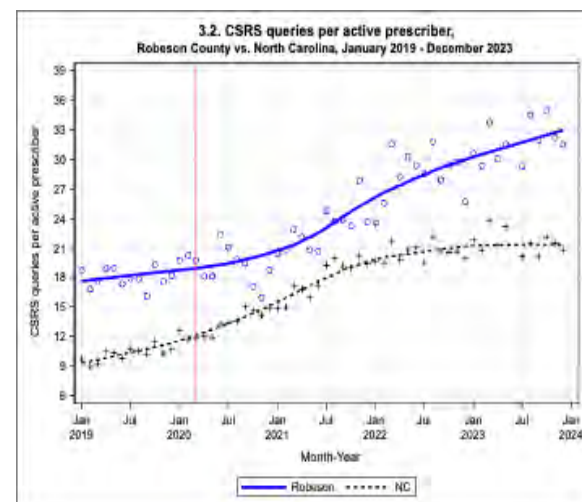
Wake Forest University School of Medicine develops

Reports that SPF-RX communities use to:

- Assess their progress in increasing CSRS utilization and reducing high-risk prescribing
- Identify opportunities for improvement, asking communities questions such as:
 - *How do we compare to the state? Why?*
 - *Is there anything surprising about our trends? What might be the underlying reasons for that?*
 - *What is the easiest trend to positively influence? Is there one strategy that might impact multiple trends? Do we have the capacity to utilize it? What resources do we need?*

Data for the scorecards comes from:

- NC Controlled Substance Reporting System



Turning SPF-RX Data Into Prevention Insights – Youth and Young Adult Prevention Survey Data

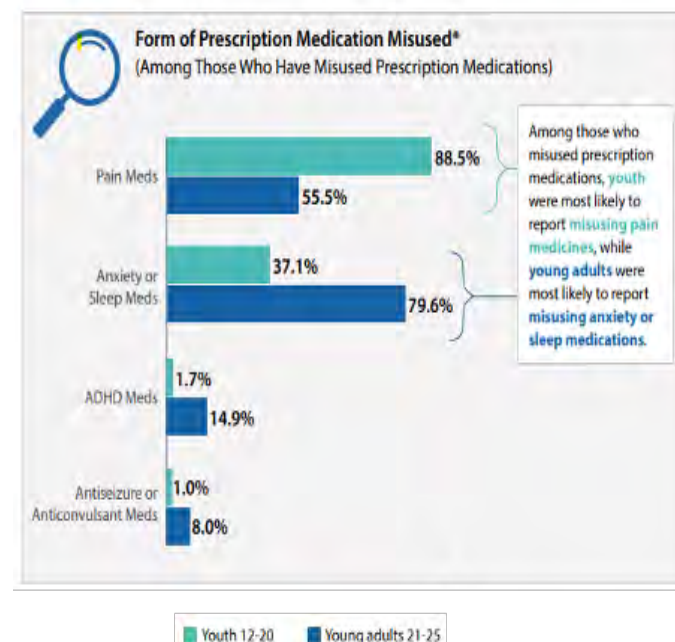
Wake Forest University School of Medicine conducts a *survey* every two years to provide information for data-driven decision making, with data disseminated via:

- The North Carolina Substance Use Prevention Data Dashboard
- Survey reports
- Presentations and papers

Survey data can be found at:

- The Prevention Resource Repository

(<https://school.wakehealth.edu/about-the-school/prevention-resource-repository>)



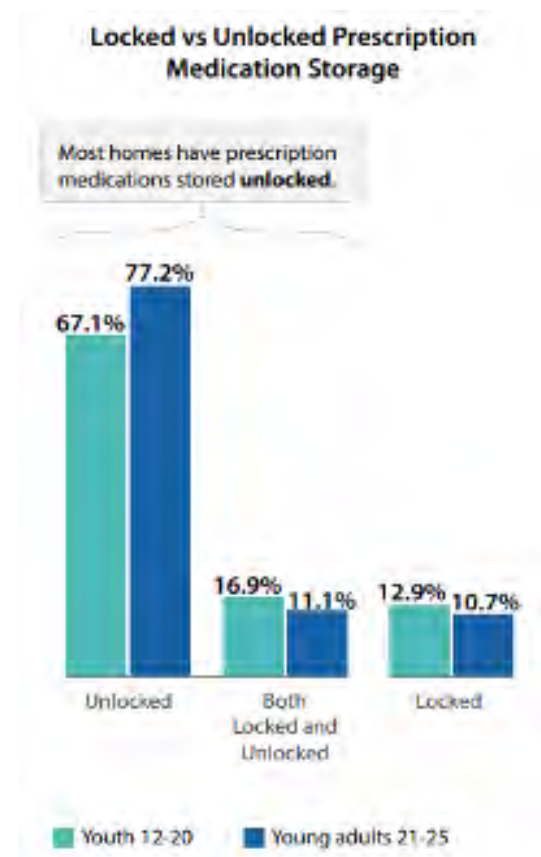
Turning SPF-RX Data Into Prevention Insights – Youth and Young Adult Prevention Survey Data

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NC Youth and Young Adult Substance Misuse Prevention Survey

Prevention Resource Repository

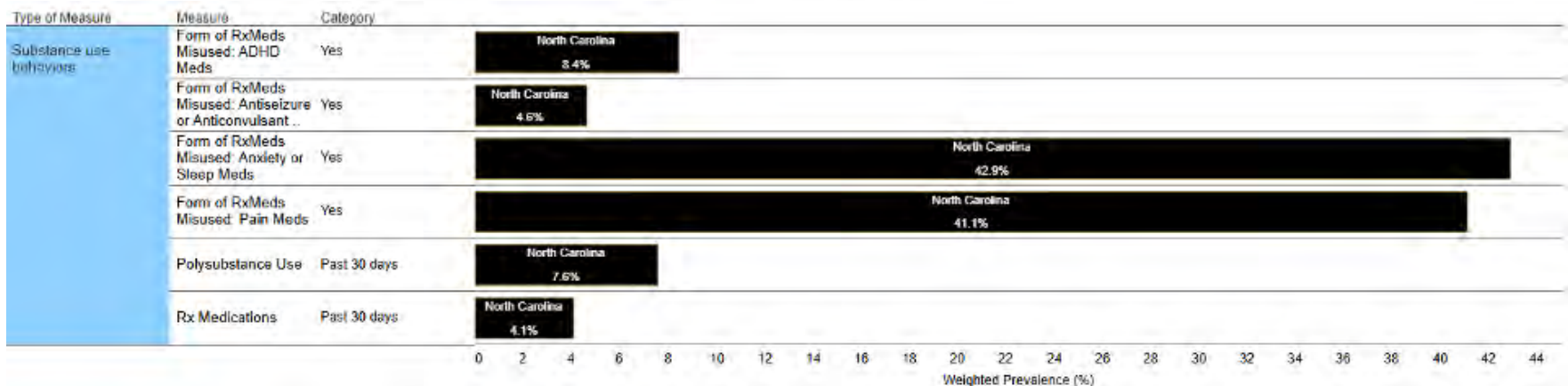
The Prevention Resource Repository at Wake Forest University School of Medicine supplies resources to help community-based substance misuse prevention organizations and coalition effectively implement state of the art prevention practices.

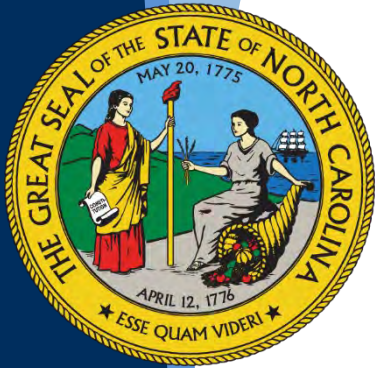
Our mission is to support communities in their transition to results-oriented substance misuse prevention practice by:

- Providing substance misuse prevention data resources to assist communities in assessing and prioritizing local needs
- Supporting preventionists in conducting a substance misuse prevention community needs assessment
- Developing best practice guidelines for substance misuse prevention and assisting communities in their implementation and identification of evidence-based prevention strategies

[Return to About the School](#)

[Substance Use Dashboard](#)





NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

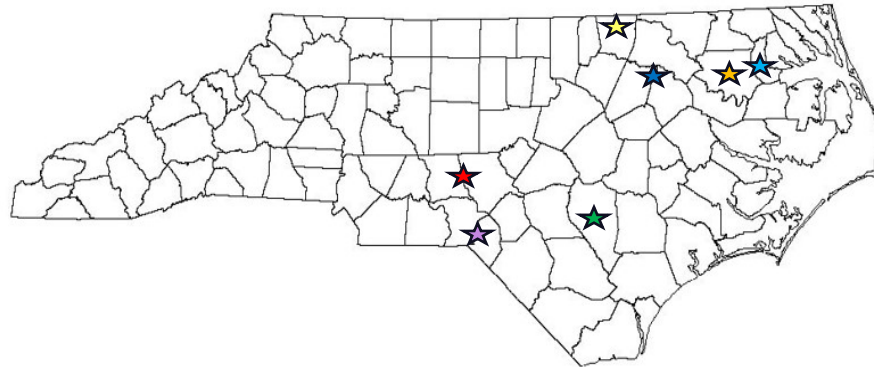
Partnerships for Success (PFS)

Jessica Dicken on behalf of APNC

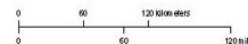
NC Partnerships for Success (PFS) 2023

- 1. Decrease substance use & impact indicators of mental health among youth & young adults ages 12-25 by implementing data-driven substance use/misuse (alcohol, cannabis, prescription medication) prevention & mental health promotion strategies in 7 rural Subrecipient Communities (SRCs)**
 - Increase perception of harm
 - Decrease access
 - Decrease onset and progression of misuse
 - Promote social-emotional health & resilience
 - 2. Increase prevention infrastructure capacity to address identified needs in rural SRCs**
 - Utilize the Strategic Prevention Framework to implement prevention strategies
- * Subrecipient Community (SRC) funding award: April 2024 – September 2028, up to \$125,000 per year**

North Carolina Partnerships for Success Subrecipient Communities



- ★ Duplin County – NC Cooperative Extension 4-H
- ★ Halifax County – Insight Human Services
- ★ Hoke County – Tia Hart Community Recovery Program
- ★ Martin County – Martin Tyrrell Washington District Health Department
- ★ Robeson County – Robeson Health Care Corporation
- ★ Tyrrell County – Martin Tyrrell Washington District Health Department
- ★ Washington County – Martin Tyrrell Washington District Health Department



PFS Data-Driven Strategies

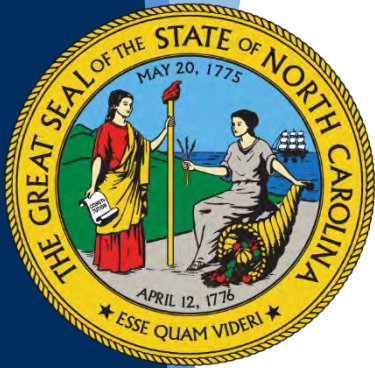
Subrecipient Community Implementation

1. Talk It Up. Lock It Up! TM
2. Lock Your Meds
3. 988 Suicide & Crisis Lifeline
4. Life Skills
5. Too Good for Drugs
6. PreVenture
7. Alcohol Purchase Surveys & Merchant Education

PFS Progress & Impact

- **233** SRC stakeholders & partners engaged
- Conducted community needs assessments
- Developed SRC Logic Models
- Developed monthly Action Plans
- Quarterly evaluation tracking tool
- Completion of **12** Strategic Prevention Framework Trainings
- Reported increased community perception of harm of underage drinking

Insights Gained: Adapting technical assistance support to individual learning needs & styles



NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

SOR and Community Collaborations/Coalitions

**Erin Day, Community Impact North Carolina
(CINC)**

Community Collaborations/Coalitions

Important Role in Opioid Settlement Dollars

- Richmond County Drug Endangered Task Force
- Pitt County Coalition on Substance Use (PCCSU)
- Wilson County Substance Use Prevention Coalition
- Nash County C.A.R.E Coalition
- Wayne County CALM Coalition
- Pender SUPP
- Chatham Drug Free Coalition

Leveraging Other Funds

- Coalitions continue to find ways to help impact their communities *without receiving Opioid Settlement Funds*.
- Some do this with small pots of funding from local and state opportunities. While others have leveraged their local work to receive federal funds when needed.
- Many have done this due to the restriction within the opioid settlement funds as it relates to primary prevention, as *many local governments have chosen at this time to go with Option A Strategies of the state opioid settlement funds Memorandum Of Agreement*.

State Opioid Response Grant for Prevention

- SAMHSA grant awarded to the state of North Carolina since 2019
- Currently 7 community prevention providers funded to serve 9 counties
- Selected through RFA process
- Most on a continuation



Required Strategies:

Outcome goals are to achieve impact, improve coalition strength and improve community conditions.

Reduce access to prescription drugs

- Increase proper medication storage behaviors through the reach/exposure of messages and provision medication lockboxes.
- Increase safe medication disposal behavior through messages, Provision of at-home disposal kits and increased access to permanent disposal boxes.
- Support community partners in the creation of policies related to at-home disposal kits and/or permanent disposal boxes.

Increase naloxone access and utilization

- Provide naloxone trainings
- Provide doses of Naloxone to community partners
- Support community partners in creation policies

Increase capacity to address opioid prevention.

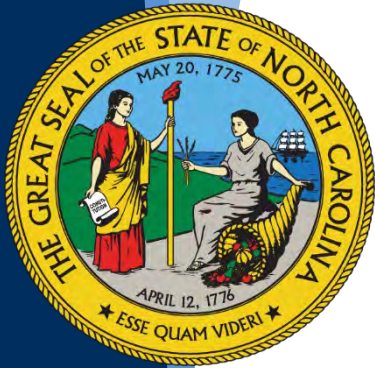
- Provide Office-Based Opioid Treatment (OBOT) providers with medication lockboxes.
- Provide medication lockboxes, medication disposal kits, and opioid antagonists to non-traditional partners
- Increase community knowledge of permanent medication drop boxes, installation of drop boxes if needed, and/or
- Co-coordination in a community medication take-back event.

Measured SOR Community Outcomes for FY 2024/25

- Partnerships created: **166**
- Policies created: **37**
- Media pieces (paid and earned): **178**
- Number of trainings: total # of attendees: **134 / 2334**

(Pre and Post tests completed)

- Number of lock boxes distributed: **5847**
- Number of disposal kits distributed: **14,548**
- Number of naloxone distributed: **4,622**
- Number of LYM Rack Cards distributed: **8,953**
- Other tangible materials distributed: **8,728**



NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

Pivot Point

Matthew Nannis

After-School Prevention-based Leadership Program



PIVOTPoint WNC provides nationally accredited therapeutic adventure programs. Through dynamic, engaging group processing and facilitation, we establish the foundation for pro-social life choices.

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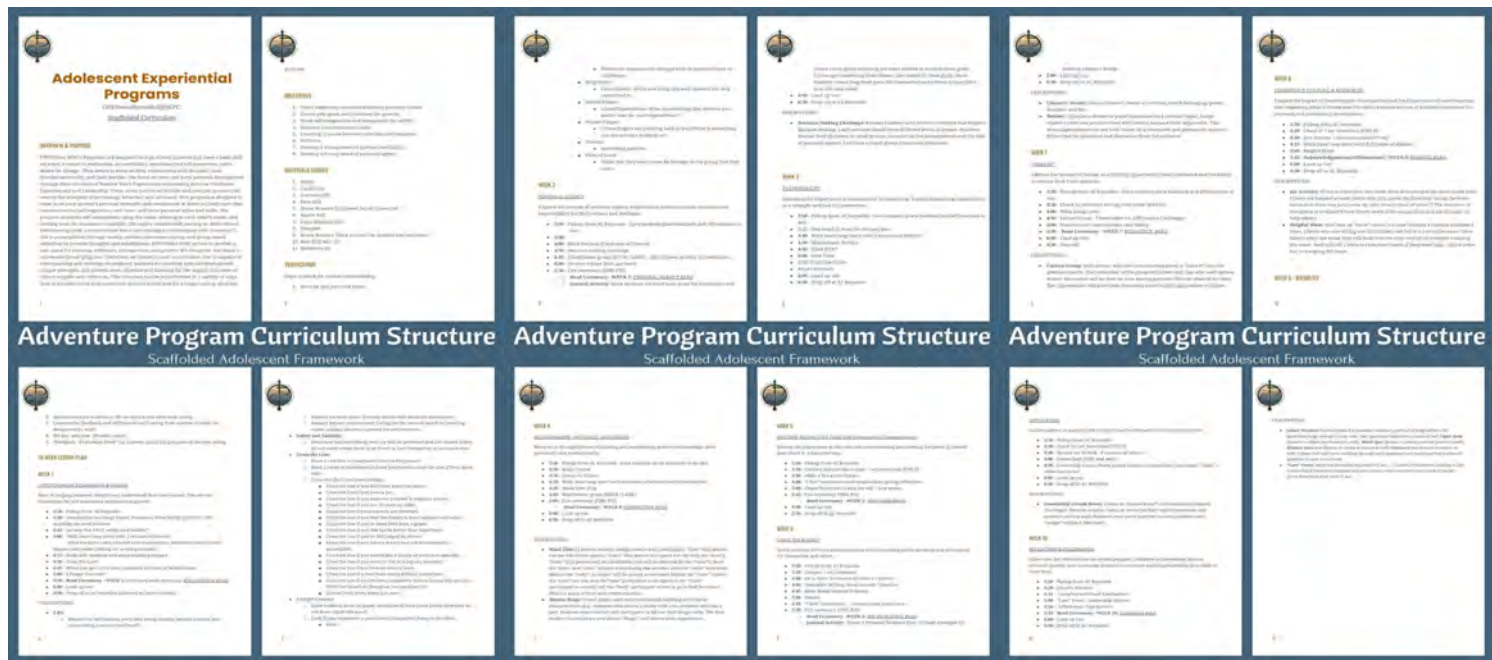
After-School Prevention-based Leadership Program



| Target Population

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Pre- and Post-Outing Assessments



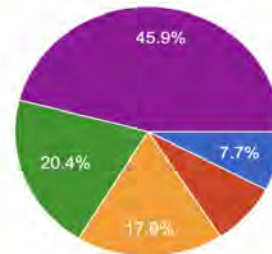
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Pre- and Post-Outing Assessments



How effectively did you participate in a healthy relationship with your family? Think of 5 specific family interactions from this week.

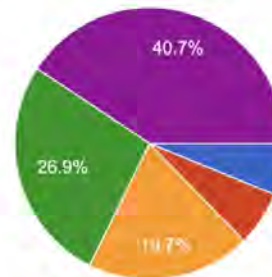
responses: 87



- I didn't participate healthily in any family interaction
- I participated healthily once
- I participated healthily 2-3 times
- I participated healthily 4 times
- I participated healthily every time

How effectively did you take care of yourself and practice self-compassion recently?

responses: 87



- I didn't take care of myself nor practice self-compassion
- I took care of myself and practiced self-compassion rarely
- I took care of myself and practiced self-compassion sometimes
- I took care of myself and practiced self-compassion regularly
- I took care of myself and practiced self-compassion always

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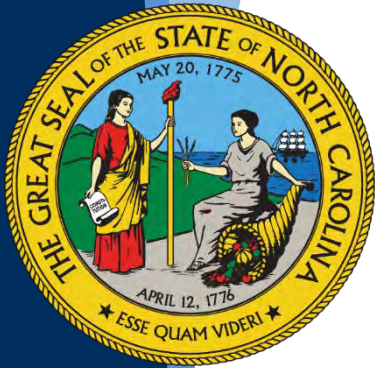
Growth in Real Time; in Real World Settings

PIVOTPoint has been life-changing for my son and our family. As an adopted, mixed-race teen who has struggled with abandonment issues, he has had a hard time trusting others, forming relationships, and managing his emotions. These challenges often overshadow his kindness, intelligence, and compassion. But under the guidance of these incredible facilitators, I have seen remarkable growth.

Through this program, my son has not only connected with his peers but has also begun to trust adults in a way I never thought possible. He is learning positive coping strategies, gaining confidence, and showing a level of engagement, I haven't seen before. He loves the program so much that he asked to continue beyond the initial 10 weeks—a testament to the safe, supportive, and transformative space PIVOTPoint provides. There is rediscovered hope that the lessons he's learning here will extend into his relationships with friends and family, helping him build the meaningful connections he deserves.

I cannot overstate the impact this program has had on my son, our family, and our day-to-day life. PIVOTPoint is filling a critical gap for youth who need guidance, belonging, and the tools to navigate life's challenges. I am incredibly grateful for the work they do and would highly recommend this program to others.

—Parent of Current Program Client



NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

PATH: Home Remedies

Jessica Zucchini and Schell McCall

Home Remedies: Community Options Addressing Pain and Stress



- Based in Mitchell and Yancey counties
- Partnership between PATH and local complementary health providers
- Developed after health care providers requested community-based supports to help patients prevent/reduce opioid use



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Home Remedies: Community Options Addressing Pain and Stress



- Providing evidence-based options to help individuals reduce pain and improve quality of life
- Goal of preventing and/or reducing the use of opioid and other pain medications
- With SOR funding support, services are **free of charge** to the community



Permission has been granted for the use of the Home Remedies logo and for these images to be shared.



The Home Remedies Program offers strategies for pain management and stress reduction:

- community clinics
- educational series
- online courses

Evidence-based complementary approaches offered include meditation, acupuncture, chiropractic, massage, yoga, physical therapy, mindful movement, resiliency skills, and more.



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Impact data:

- reduction in pain/stress
- learned new skills to manage pain/stress

A 2019 VA study showed participants in their Whole Health program had a 3x higher reduction in opioid use compared to those who only received traditional medical care



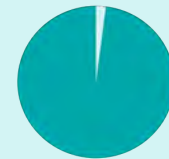
15%

Of participants surveyed took medications for pain on 20+ of the last 30 days



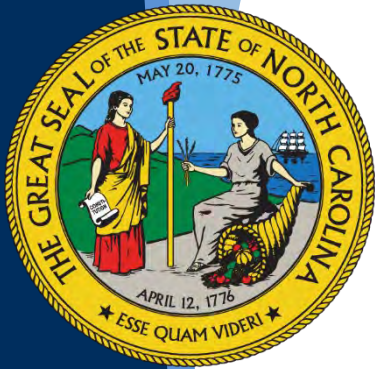
90%

Of participants surveyed learned new strategies for managing pain/stress



98%

Of participants surveyed feel empowered to make lifestyle changes that reduce pain/stress

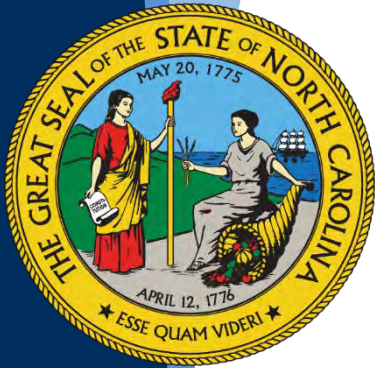


NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

Opioid Prevention in Action

Regina Propst, Insight

Deeanna Hale Holland, Coastal Horizons



NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

Insight Human Services- Surry County

**Regina Propst, CPS, Program Manager
Iredell, Yadkin, and Surry Counties**

September 19, 2025

Insight Human Services Overview

- Private Non-Profit Agency based in Winston-Salem, NC
- Treatment and Intervention: 60+ Counties
- Primary Prevention: 18 Counties
- Evidence-based prevention strategies include:
 - Youth Prevention Education
 - Community-Based Process (Coalition/Collaboratives/Other Community Groups)
 - Environmental Management Strategies (Communication Campaigns, Policy Work, Synar Merchant Education, etc.)
- Funding Sources: Substance Use Prevention, Treatment, and Recovery Services (SUPTRS), Prescription Drug Overdose (PDO), **State Opioid Response (SOR-YPE)**, Strategic Prevention Framework-Rx (SPF-Rx), Strategic Prevention Framework-Partnership for Success (SPF-PFS), State Opioid Response (CINC-SOR), and other local funding



Surry County Opioid Prevention Work

- Youth Prevention Education
 - Too Good for Drugs
- Lock Your Meds Campaign
 - Medication Storage and Disposal Efforts
 - Promotion of Permanent Drop Boxes and Take Back Events
 - Social Media, Bench Ads, and other digital ads
- Naloxone Distribution and Education
 - Naloxone distribution (individual kits, Onebox, Vending Machine) and Naloxone training: agencies, businesses, and community members
- Prescriber Training: 101 participants trained
 - Topics included: Best Practice Steps for Opioid Prescribing, NC STOP ACT, Utilization of NC Controlled Substance Reporting System (CSRS), Effective Ways to Educate Patients about Opioids, Alternatives to Pain Management, Co-Prescribing Naloxone, Medication Assisted Treatment

Surry YPE: Too Good for Drugs

- Universal Prevention
- Focused on Kindergarten through 5th Grade
- 10 lessons
- 30-50 minutes
- 1-2 times a week
- Interactive: role modeling, games, and activities
- Pre and Post Knowledge Test/Survey

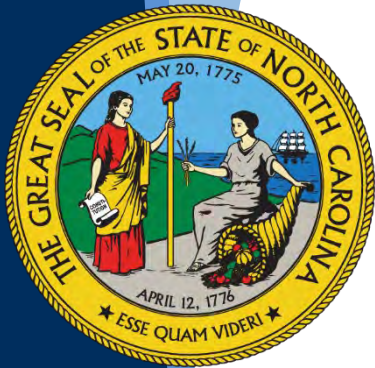
Surry YPE: Too Good for Drugs

- Partnered with Surry County School District to determine the schools that would be best served by the program.
- Partnered with Mt. Airy Parks and Recreation to implement the program with their afterschool program at Reeves Community Center.
- Cedar Ridge Elementary (Fall 2023): 336
- Reeves Community Center (Spring 2024): 22
- Flat Rock Elementary (Fall 2024): 101
- Westfield Elementary (Spring 2025): 160
- Pilot Mountain Elementary (Spring 2025): 198
- Total: 817



Terri Fowler, CPS, Vice President of Prevention
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Kelley Grimes, CPS, Director of Prevention
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NC DEPARTMENT OF HEALTH AND HUMAN SERVICES

Coastal Horizons/Partnerships

Deeanna Hale-Holland, CPS
Prevention Director
New Hanover, Pender, Brunswick,
Columbus

- Private Non-Profit
- Serving 57 Counties
- Mental Health and Substance Use Treatment, Justice Services, Crisis Services, Prevention and Outdoor Adventure
- Wrap Around Services



Impact Goals

PDO, SOR, YPE, SUPTRS

Individual

- Decrease Overdoses
- Prevent Misuse
- Secure Medication Storage
- Safe Medication Disposal
- Build Youth Skills

Community

- Increase Access to Resources
- Reduce Stigma
- Develop Champions
- Increase By-Stander Readiness to Respond

Community Distribution

2 years/4 counties

3,519

Locking Containers

389

People Trained

7,862

Disposal Kits

87%

Very Confident

14

Community Health Boxes

1,909

Naloxone/Narcan TM

235

Youth Completing *Unique You* ©

21

ONEBoxes ®

Prevention Resources

Medication Safety Kit



Community Health Box



ONEBox ®

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Champions

- Warner Temple AME Zion Church
- Rocky Point Pavilion Pharmacy
- Waccamaw Tribal Center
- Wilmington Fire Department/Senior Center

Thank You!

DMHDDSUS Contacts:

Jessica Dicken, MSW
Assistant Director, Prevention
jessica.dicken@dhhs.nc.gov

Angela Maxwell, PhD, CPS
Substance Use Prevention Block Grant Manager
angela.maxwell@dhhs.nc.gov

Panel: Program Spotlights

- *Moderator: Jessica Dicken, Division of Mental Health, Developmental Disabilities, Substance Use Services*
- Tia Scriven, Haven House
- Greta Metcalf, HIGHTS
- Kenny Parmenter, HIGHTS
- Kelly Graves, Kellin Foundation

Neurobiology of Addiction and the Adolescent Brain

- Shuchin Shukla, North Carolina Technical Assistance Center; Greenville Comprehensive Treatment Center; Goldie Health



Why is this topic important?

While adolescent opioid misuse and opioid use disorder, overdose continues to rise, now 3rd most common cause of US adolescent mortality

Overdose is top cause of mortality for adults under age 45.

90% Adult substance use disorder begins in adolescence.

So let's start at the beginning of how OUD develops: why do adolescents use substances in the first place, and then how does that lead to OUD?

Figure: Drug-Overdose Mortality and Previous-Year Illicit-Drug Use among High-School-Aged Adolescents in the United States

Why do adolescents use substances?

TABLE. Motivations for drug use among persons aged 13–18 years being assessed for substance use disorder treatment who reported use of alcohol, marijuana, or other drugs during the previous 30 days and persons with whom they used substances — National Addictions Vigilance Intervention and Prevention Program Comprehensive Health Assessment for Teens, United States, 2014–2022

Measure	No. (%)							
	Overall* 9,543 (100)	Alcohol† 4,648 (49)	Marijuana ^{§,†} 7,994 (84)	Nonprescription drug† 2,032 (21)	Prescription medication			Any ^{¶¶}
					Pain medication** 1,222 (13)	Stimulant†† 834 (9)	Sedative/ Tranquilizer ^{§§} 1,037 (11)	
Motivation***								
To feel mellow, calm, or relaxed	6,968 (73)	1,862 (40)	6,090 (76)	1,085 (53)	745 (61)	243 (29)	569 (55)	—
To sleep better or fall asleep	4,216 (44)	620 (13)	3,644 (46)	560 (28)	425 (35)	94 (11)	364 (35)	—
To stay awake	1,212 (13)	133 (3)	309 (4)	618 (30)	128 (10)	262 (31)	66 (6)	—
To feel less shy or more social	2,056 (22)	926 (20)	1,183 (15)	456 (22)	152 (12)	111 (13)	116 (11)	—
To stop worrying about a problem or forget bad memories	4,169 (44)	1,514 (33)	3,148 (39)	869 (43)	382 (31)	165 (20)	276 (27)	—
To have fun or experiment	4,771 (50)	2,372 (51)	3,157 (39)	1,124 (55)	431 (35)	248 (30)	330 (32)	—
To be sexier or make sex more fun	1,033 (11)	441 (10)	664 (8)	320 (16)	107 (9)	51 (6)	52 (5)	—
To lose weight	400 (4)	46 (1)	104 (1)	199 (10)	40 (3)	54 (7)	20 (2)	—
To make something less boring	3,893 (41)	1,634 (35)	2,846 (36)	895 (44)	361 (30)	221 (26)	259 (25)	—
To improve or get rid of the effects of other drugs	1,008 (11)	356 (8)	640 (8)	393 (19)	183 (15)	101 (12)	132 (13)	—
To concentrate better	2,126 (22)	84 (2)	1,637 (20)	412 (20)	121 (10)	230 (28)	74 (7)	—
To deal with chronic pain	1,326 (14)	121 (3)	1,055 (13)	227 (11)	231 (19)	44 (5)	80 (8)	—
To help with depression or anxiety	3,787 (40)	1,087 (23)	3,068 (38)	840 (41)	398 (33)	191 (23)	328 (32)	—
To fit in	1,144 (12)	487 (10)	641 (8)	226 (11)	87 (7)	49 (6)	49 (5)	—
Other reason	2,149 (23)	704 (15)	1,074 (13)	318 (16)	176 (14)	120 (14)	133 (13)	—

Source: Connolly S, Govoni TD, Jiang X, et al. Characteristics of Alcohol, Marijuana, and Other Drug Use Among Persons Aged 13–18 Years Being Assessed for Substance Use Disorder Treatment — United States, 2014–2022. MMWR Morb Mortal Wkly Rep 2024;73:93–98.

DOI: <http://dx.doi.org/10.15585/mmwr.mm7305a1>.

Why do people keep using substances?

Figure 2: Laura's Pathway to Heroin Addiction

SU -> SUD

- SU starts with exposure to substance
 - Most adults with SUD had adolescent substance exposure PLUS trauma exposure...
- But most SU does not result in SUD... WHY?

The ACE Pyramid

Pair of ACEs Tree

SUD DSM-V definition: at least 2 elements

Physiologic

- Tolerance:
 - (a) a need for markedly increased amounts of substances to achieve intoxication or desired effect, or
 - (b) markedly diminished effect with continued use of the same amount of a substance
- Withdrawal:
 - (a) the characteristic substance withdrawal syndrome, or
 - (b) the same (or a closely related) substance are taken to relieve or avoid withdrawal symptoms
- **tolerance and withdrawal cannot be the only criteria for SUD diagnosis*

Risk/Harm

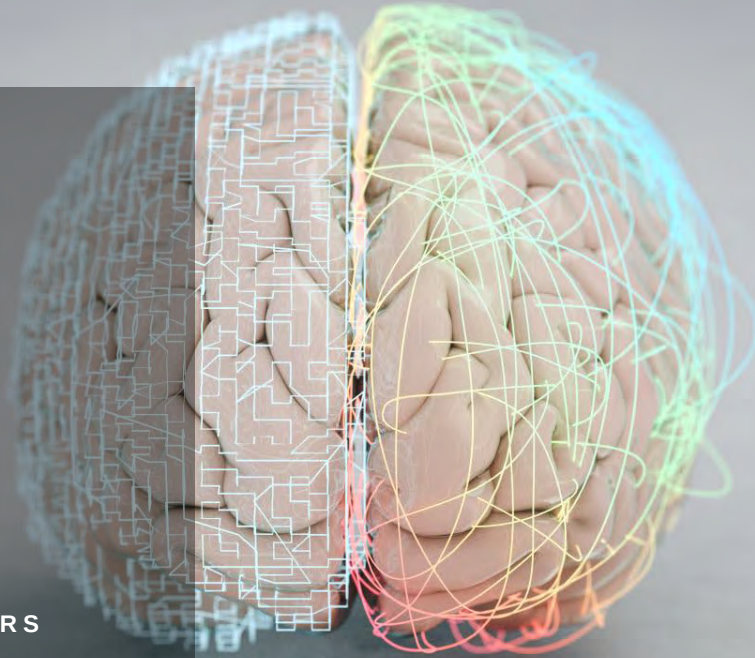
- Recurrent substance use resulting in failure to fulfill major role obligations at work, school or home
- Continued substance use despite having persistent or recurrent social or interpersonal problems caused or exacerbated by the effects of substances
- Important social, occupational or recreational activities are given up or reduced because of substance use
- Recurrent substance use in situations in which it is physically hazardous
- Continued use despite knowledge of having a persistent or recurrent physical or psychological problem that is likely to have been caused or exacerbated by opioids

Lack of Control

- Substance is often taken in larger amounts or over a longer period than was intended
- Persistent desire or unsuccessful efforts to cut down or control use
- Great deal of time is spent in activities necessary to obtain substance, use substance, or recover from its effects
- Craving, or a strong desire to use substance

Brain is Behavior

SUBSTANCE USE DISORDERS
ARE REFLECTED IN
NEUROCHEMISTRY AND
NEUROANATOMY



Neurochemistry and Homeostasis

Interpretation of
Chemical Synaptic
Transmission

Different Types of Synapses

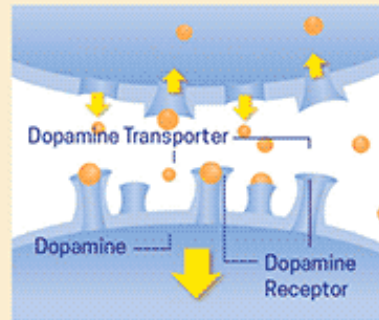
Some drugs target the brain's pleasure center

Brain reward (dopamine pathways)



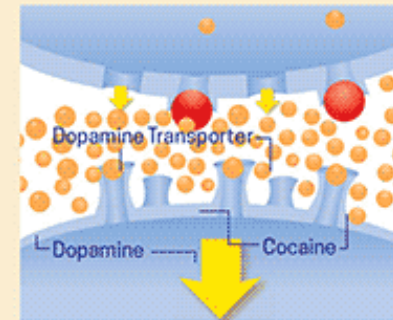
These brain circuits are important for natural rewards such as food, music, and sex.

How drugs can increase dopamine



While eating food

Typically, dopamine increases in response to natural rewards such as food. When cocaine is taken, dopamine increases are exaggerated, and communication is denied.



While using cocaine

NEUROANATOMY AND PLASTICITY

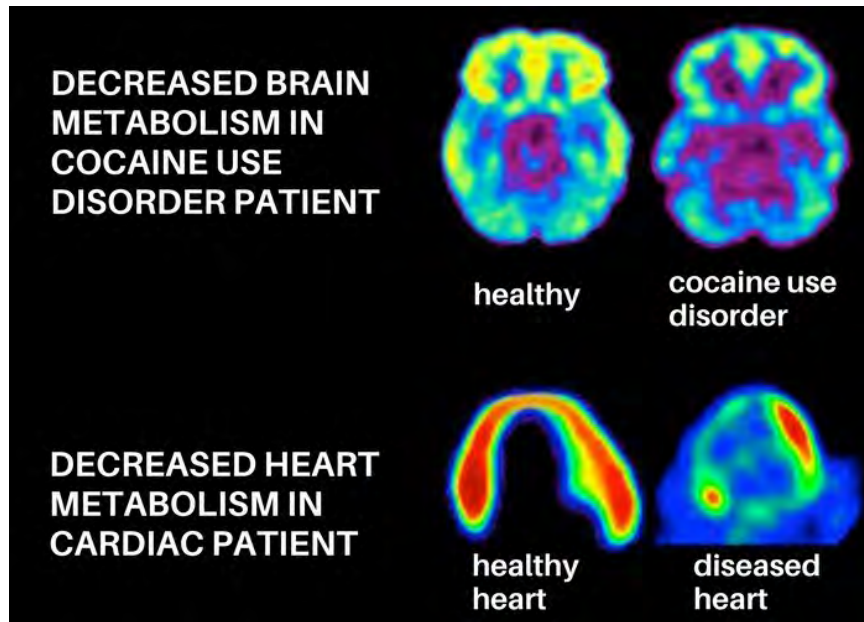
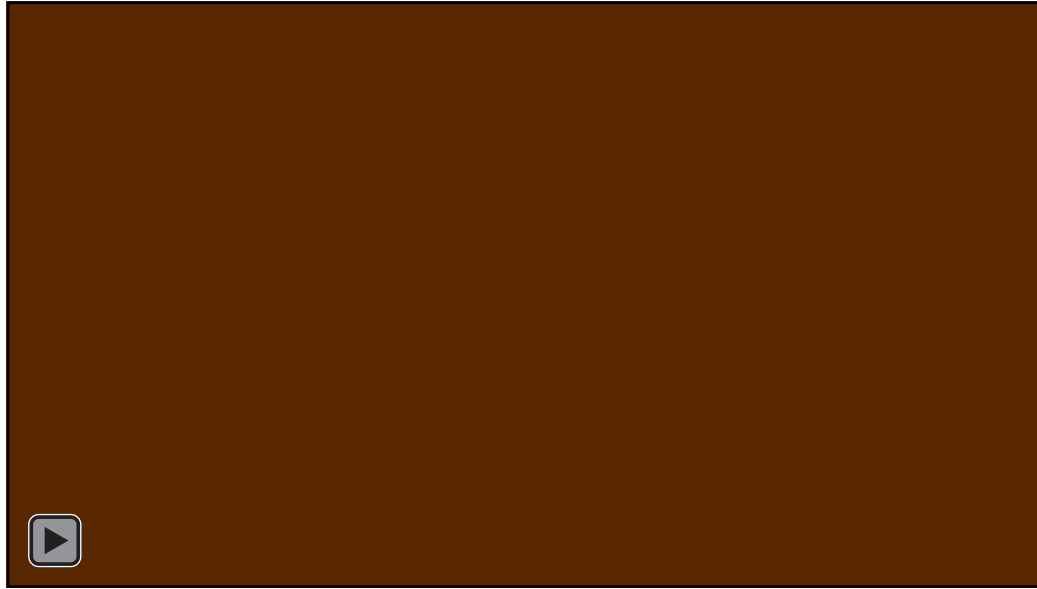


Image Source: National Institute on Drug Abuse

<https://nida.nih.gov/publications/drugs-brains-behavior-science-addiction/treatment-recovery>

Figure 1: Stages of
Addiction Cycle



What's Different about The Adolescent Brain?



Adolescent Brain: Growth and Pruning, so Give the Right Fertilizer!

- Limbic system: Novelty seeking, reward vs fear, emotion-driven behavior
- Prefrontal cortex development: cognitive structuring, abstract thinking, impulse control, planning for future consequences, delayed gratification

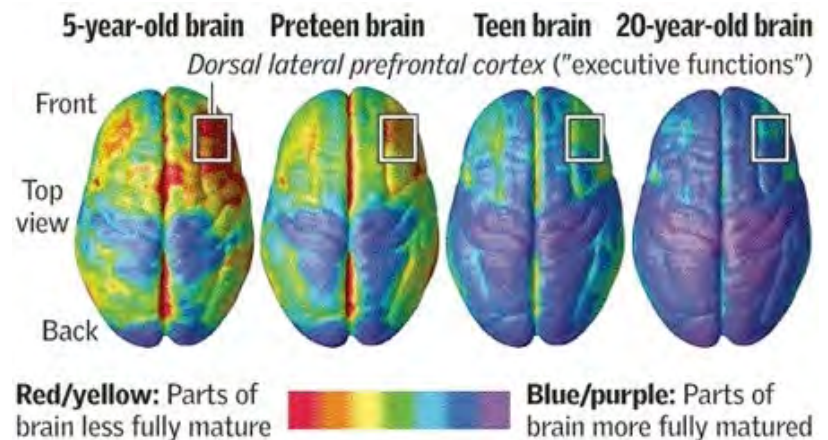


Image Source: National Institute of Mental Health; Paul Thompson, Ph.D., UCLA Laboratory of Neuro Imaging

Adolescent Brain and Substance Exposure

- Earlier exposure of all substances is associated with ongoing use and disorder
- Gateway drugs include nicotine...
 - OUD as the final stage in SUD development?
- More severe substance use in adolescence predicts future SUD



Sources:

Garofoli M. Adolescent Substance Abuse. *Prim Care*. 2020;47(2):383-394. doi:10.1016/j.pop.2020.02.013

ND Volkow, EM Wargo. [Association of Severity of Adolescent Substance Use Disorders and Long-term Outcomes\(link is external\)](#). *JAMA Network Open*. DOI: 10.1001/jamanetworkopen.2022.5656 (2022)

DAA Baranger, et al. [Association of Mental Health Burden With Prenatal Cannabis Exposure From Childhood to Early Adolescence: Longitudinal Findings From the Adolescent Brain Cognitive Development \(ABCD\) Study](#). *JAMA Pediatrics*. DOI: 10.1001/jamapediatrics.2022.3191

Adolescent Brain and Trauma

- Trauma associations: feedback cycle
 - Substance use
 - Witnessing violence, carrying gun, experiencing violence
 - Suicidality and mental illness
 - Unstable housing, poverty
 - Unintended pregnancy, STIs, condomless sex
- More common in:
 - LGBTQ
 - Black, AI/AN
 - Female
 - Homeless
 - Foster care, justice-involved
- More ACES over more time = greater risk
- Epigenetics: Cortisol, amygdala, sympathetic NS, insula, D2/D3 receptors

Adverse childhood experience

Emotional abuse	During your life, how often has a parent or other adult in your home insulted you or put you down?
Physical abuse	During your life, how often has a parent or other adult in your home hit, beat, kicked, or physically hurt you in any way?
Sexual abuse	Has an adult or person at least 5 years older than you ever forced you to do sexual things that you did not want to do? (Count such things as kissing, touching, or being made to have sexual intercourse.)
Physical neglect	During your life, how often has there been an adult in your household who tried hard to make sure your basic needs were met, such as looking after your safety and making sure you had clean clothes and enough to eat?
Witnessed intimate partner violence	During your life, how often have your parents or other adults in your home slapped, hit, kicked, punched, or beat each other up?
Household substance use	Have you ever lived with a parent or guardian who was having a problem with alcohol or drug use?
Household poor mental health	Have you ever lived with a parent or guardian who had severe depression, anxiety, or another mental illness, or was suicidal?
Parent or guardian incarcerated or detained	Have you ever been separated from a parent or guardian because they went to jail, prison, or a detention center?
Cumulative ACEs count	Cumulative ACEs count = (emotional abuse + physical abuse + sexual abuse + physical neglect + witnessed IPV + household substance use + household poor mental health + incarcerated parent or guardian)

Sources:

Harper CR, Li J, Sheats K, et al. Witnessing Community Violence, Gun Carrying, and Associations with Substance Use and Suicide Risk Among High School Students — Youth Risk Behavior Survey, United States, 2021. MMWR Suppl 2023;72(Suppl-1):22–28. DOI: <http://dx.doi.org/10.15585/mmwr.su7201a3>

McKinnon II, Krause KH, Robin L, et al. Experiences of Unstable Housing Among High School Students — Youth Risk Behavior Survey, United States, 2021. MMWR Suppl 2023;72(Suppl-1):29–36. DOI: <http://dx.doi.org/10.15585/mmwr.su7201a4>.

Swedo EA, Pampati S, Anderson KN, et al. Adverse Childhood Experiences and Health Conditions and Risk Behaviors Among High School Students — Youth Risk Behavior Survey, United States, 2023. MMWR Suppl 2024;73(Suppl-4):39–49. DOI: <http://dx.doi.org/10.15585/mmwr.su7304a5>. Image above pulled from here.

ODU Treatment and Prevention



SBIRT

- AAP rec's universal SBIRT for all adolescents
- BI: behavioral intervention for mild use disorder
 - Motivational interviewing
 - Education, identifying risks/strengths
 - Harm reduction
 - Make a plan, follow up
- RT: Referral for treatment for moderate/severe disorder
 - Do you know your community providers?

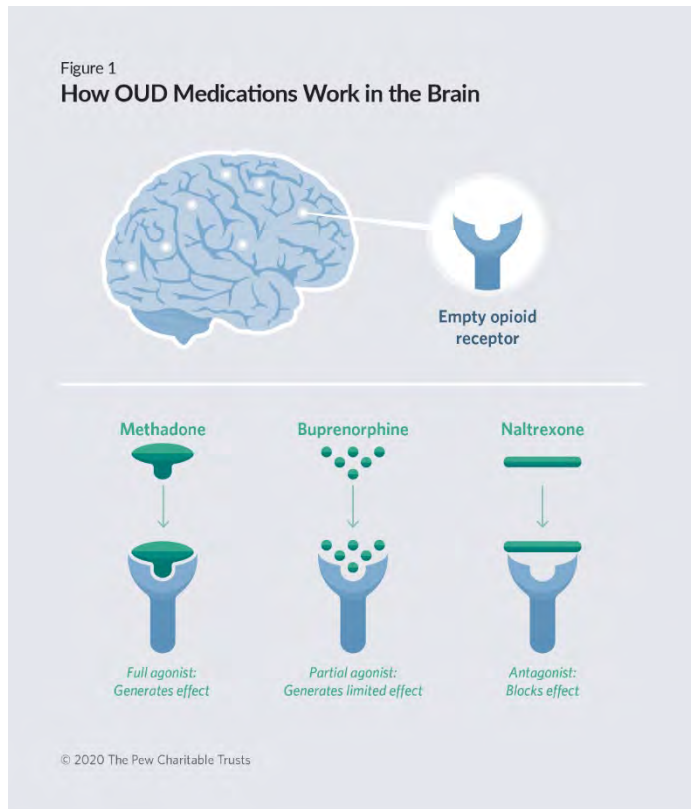
Exhibit 2: Screeners for Use with Adolescents					
	Clinician-Administered				
	Self-Administered				
For Screening Use of Other Illicit Drugs					
For Screening Tobacco Use					
For Screening Alcohol Use					
Screening to Brief Intervention (S2BI); NIDA	✓	✓	✓	✓	✓
Brief Screener for Alcohol, Tobacco, and Other Drugs (BSTAD); NIDA	✓	✓	✓	✓	✓
Alcohol Screening and Brief Intervention for Youth; NIAAA	✓				✓
CRAFFT; Boston Children's Hospital	✓	✓	✓	✓	✓

Stages of Change Model

MAT: Medication for Addiction Treatment

- FDA approved gold standard of care for opioid use disorder: buprenorphine (age 16+), methadone (age 18+), naltrexone (age 18+)
 - Off label treatment allowed for younger; but insurance coverage tricky...
- Associated with improvements in use, overdose risk, and often social outcomes
- Limited research in minors, just like most medications for most medical problems
- Nevertheless, recommended by American Academy of Pediatrics, American Society of Addiction Medicine, National Institute of Drug Abuse, SAMHSA
- Minors CAN consent to confidential addiction treatment, including with medication, without parents' permission/knowledge (if appropriate decision-making capacity)
 - Except methadone- needs parental consent

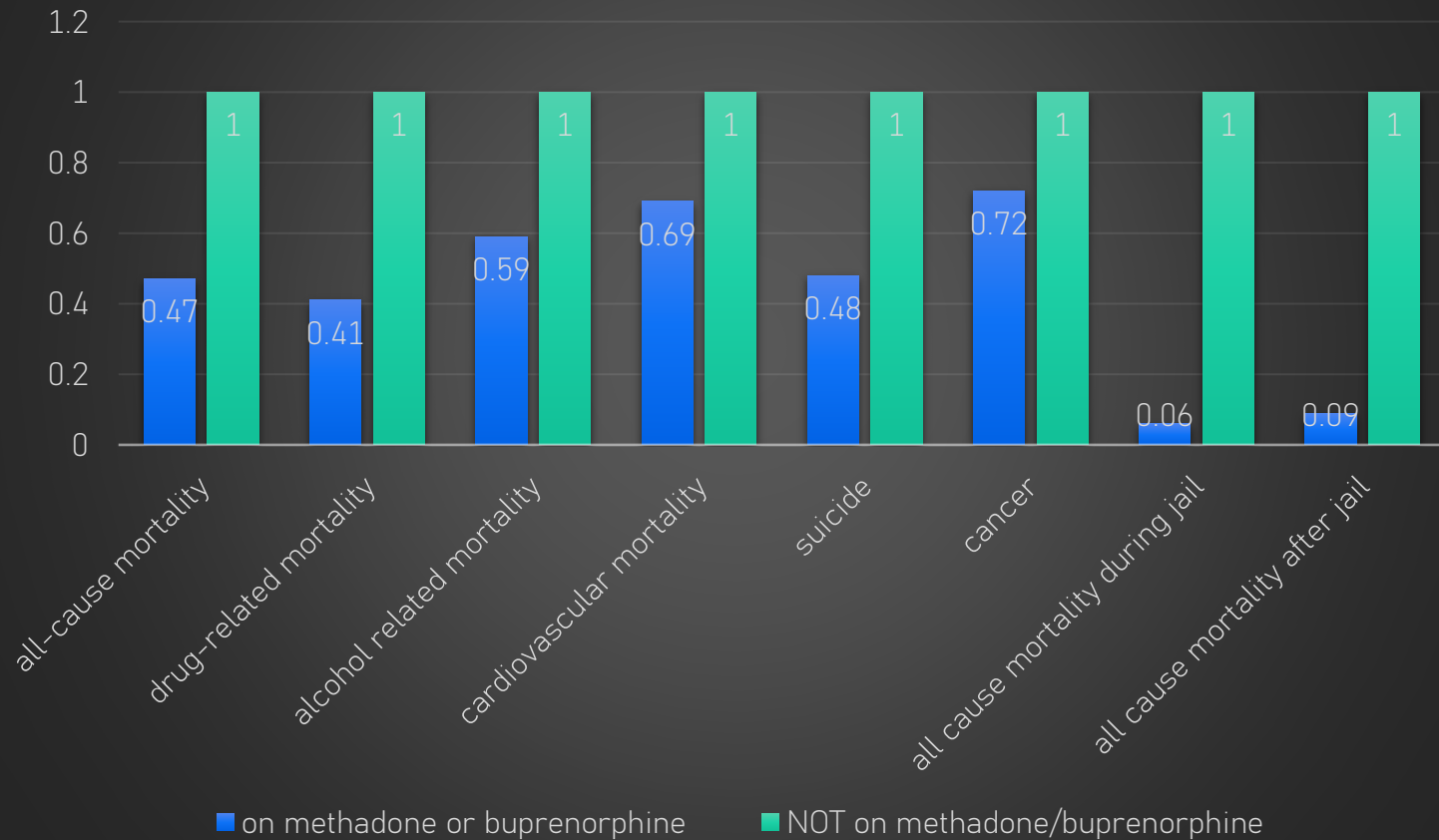
MOUD: Medication for Opioid Use Disorder



Source: <https://www.pew.org/en/research-and-analysis/fact-sheets/2020/12/medications-for-opioid-use-disorder-improve-patient-outcomes>

- OTP = opioid treatment program
 - Only possible site for methadone treatment
 - Meds *administered or dispensed*, never prescribed: daily observed dosing initially, and increasingly longer “take-homes”
 - Slow dose titration due to higher risks
 - Buprenorphine also available
 - Regular counseling required
- OBOT = office based opioid treatment
 - Anyone with a DEA can prescribe buprenorphine
 - Counseling optional
 - Often integrated with other health services (primary care, psychiatry, OBGYN, pediatrics)
- Both utilize drug testing

Relative Risk Reduction of Methadone/Buprenorphine



How to Reduce Adolescent Overdose?

Prevent substance
use initiation,
including gateway
drugs

Reduce illicit drug
availability: internet,
trafficking

Support adolescent
resilience,
particularly for high-
risk groups

Educate about
counterfeit pills:
teens, parents,
schools

Naloxone access
and overdose
prevention training:
teens, parents,
schools

Expand treatment
access: SUD and
Mental Health

(Never use alone, test
strips)

Adolescent Brain and Resilience

School connectedness

- “peers and adults care about me”
-worst for LGBTQ and black/Hispanic

Social clubs, support groups, and
Antibullying policies

Housing and economic stability

Affordable housing, living wage, public
benefits, school lunch, SNAP

Social/emotional learning

-exercise that prefrontal cortex!

SEL curriculum, sports, clubs, art,
recess, psychotherapy

Secure adult relationships

support parents = support kids

What doesn't work?

Original Investigation | Substance Use and Addiction

March 19, 2025

Law Enforcement Drug Seizures and Opioid-Involved Overdose Mortality

Alex H. Kral, PhD¹; Jamie L. Humphrey, PhD¹; Clyde Schwab, BS¹; [et al](#)

[» Author Affiliations](#) | [Article Information](#)

JAMA Netw Open. 2025;8(3):e251158. doi:10.1001/jamanetworkopen.2025.1158

Key Points

Question Is there a geospatial association between opioid-involved overdose mortality and law enforcement drug seizures in San Francisco?

Findings This cross-sectional study included 2653 drug seizure crime events. Within the surrounding 100, 250, and 500 meters, drug seizures were associated with a statistically significant increase in the relative risk for fatal opioid overdoses 1, 2, 3, and 7 days following law enforcement drug seizure events.

Meaning These findings suggest that the enforcement of drug distribution laws to increase public safety for residents in San Francisco may be having an unintended negative consequence of increasing opioid overdose mortality.



International Journal of Drug Policy

Volume 28, February 2016, Pages 1-9



Editors' Choice

The effectiveness of compulsory drug treatment: A systematic review

[D. Werb](#)^{a b} , [A. Kamarulzaman](#)^c, [M.C. Meacham](#)^b, [C. Rafful](#)^b, [B. Fischer](#)^d, [S.A. Strathdee](#)^b, [E. Wood](#)^{a b e}

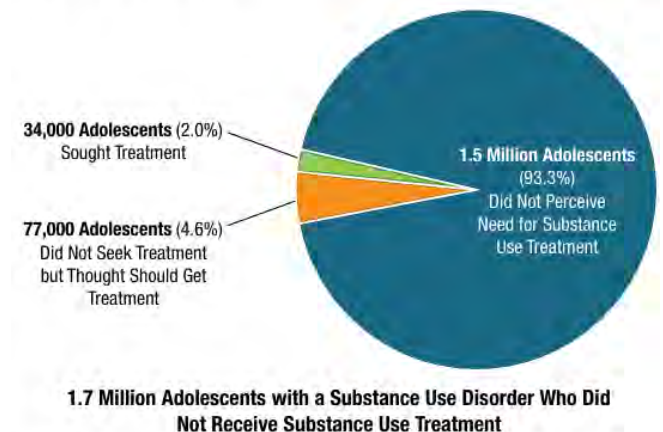
Conclusion

There is limited scientific literature evaluating compulsory drug treatment. Evidence does not, on the whole, suggest improved outcomes related to compulsory treatment approaches, with some studies suggesting potential harms. Given the potential for human rights abuses within compulsory treatment settings, non-compulsory treatment modalities should be prioritized by policymakers seeking to reduce drug-related harms.

ONGOING CHALLENGES

- Stigma: criminal justice system, pediatric health care system, cultural (families, schools, social services)
- Not enough MOUD prescribers
- Not enough pharmacies that will dispense to adolescents
- Existing systems for at-risk youth do not allow/understand MOUD
- At-risk youth do not recognize the need for treatment
- Insurance coverage
- Crumbling social contract for kids, parents, communities... Except for the very rich

Figure 72. Perceptions of Need for Substance Use Treatment: Among Adolescents Aged 12 to 17 with a Past Year Substance Use Disorder Who Did Not Receive Substance Use Treatment in the Past Year; 2024



Source:

<https://www.samhsa.gov/data/sites/default/files/reports/rpt56287/2024-nsduh-annual-national-report.pdf>

THANKS!

Shuchin@email.unc.edu

- The *North Carolina Technical Assistance Center* is a statewide initiative to provide FREE technical assistance to programs that support individuals at risk of incarceration and overdose.

AREAS OF EXPERTISE

- Harm reduction
- Reentry from incarceration
- Diversion/Deflection, including Law Enforcement Assisted Diversion (LEAD)
- Jail-based Medication for Opioid Use Disorder (MOUD)
- Naloxone access and distribution
- Program evaluation
- Data management

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browse resources
go.unc.edu/nctac



Wrap up and THANK YOU!

- Tyler Yates, Division of Mental Health, Developmental Disabilities, Substance Use Services
- Please note the Naloxone Saves domain has recently changed to: <https://naloxonesaves-nc.org/>
- The meeting recording, agenda, and PowerPoint slides will be added to our NCDHHS Overdose/OPDAAC page.
 - <https://www.ncdhhs.gov/about/departments/initiatives/overdose-epidemic/nc-opioid-and-prescription-drug-abuse-advisory-committee>

Next OPDAAC Meetings:

- December 4, 2025, hybrid
 - Topic: Stigma