

Appalachian Counties

25.5 MILLION RESIDENTS
LIVING IN **420** APPALACHIAN
COUNTIES ACROSS **13** STATES

MORE THAN 2/3 OF
APPALACHIAN COUNTIES
ARE SMALL COUNTIES

11.8 MILLION

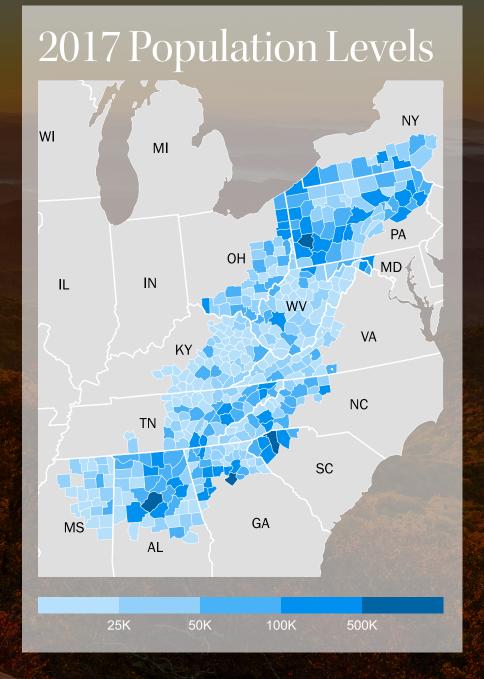
CIVILIAN LABOR FORCE POPULATION

MORE THAN **600 HOSPITALS**AND NEARLY **8,000**PUBLIC SCHOOLS

OVER \$5 BILLION
SPENT ANNUALLY ON
JUSTICE AND PUBLIC SAFETY

\$7.2 BILLION SPENT
ANNUALLY ON HEALTH AND
HUMAN SERVICES

\$29.8 BILLION SPENT ANNUALLY ON COUNTY OPERATIONS IN TOTAL



Source: NACo County Explorer data, 2019.

Notes: NACo only includes counties with county governments in this analysis. There are 3,069 counties with county governments in the U.S. – 420 of which are located in the Appalachian Regional Commission's (ARC) service area across 13 states. These 420 counties are considered "Appalachian counties," while the remaining 2,649 counties are considered "non-Appalachian counties." According to NACo, small counties have less than 50,000 residents, large counties have more than 500,000 residents and medium-sized counties are in between.

Table of Contents

- 4 Introduction: Appalachian Counties in the Eye of the Storm
- 5 The Nature of the Beast: The Opioid Economy in Appalachian Counties
- 7 Life in Appalachia: Socioeconomic Indicators Related to the Opioid Crisis
- 8 Counties on the Frontlines: How the Opioid Crisis Impacts County Operations
- **9** What to Do Now: Recommendations to County Leaders
 - $10 \quad Exercise \, Strategic \, Local \, Leadership$

Case Study: Ross County, Ohio Case Study: Mercer County, W.Va.

15 Create and Strengthen Preventive and Educational Initiatives

Case Study: Allegany County, Md.

19 Expand Access to Addiction Treatments

Case Study: Project Lazarus (Wilkes County, N.C.)

22 Implement a Criminal Justice Response to Illegal Opioid Sales and Provide Treatment and Services to Justice-Involved Individuals with Opioid Use Disorders

Case Study: A New Beginning (Campbell County, Tenn.)

26 Mitigate Local Economic Impacts and Consider New Economic Development Strategies Case Study: Coalfield Development Corporation (Lincoln, McDowell, Mingo and Wayne counties, W.Va.) Case Study: Housing Development Alliance (Perry County, Ky.)

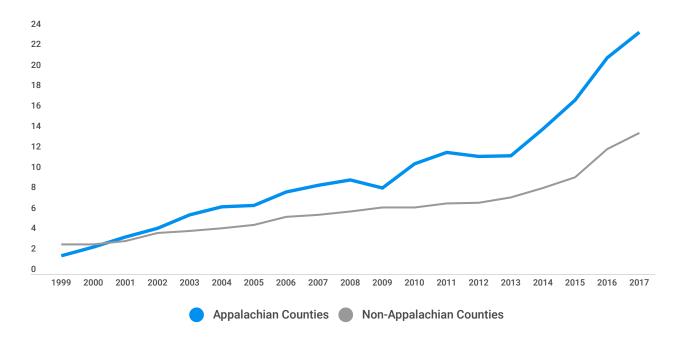
- 32 Endnotes
- 39 Acknowledgments

Introduction: Appalachian Counties in the Eye of the Storm

Across the nation, communities are suffering from rampant opioid misuse and overdose rates, and the 420 counties in the Appalachian region of the eastern U.S. have been disproportionately impacted by this epidemic of addiction. At the turn of the millennium, the opioid overdose death rate for Appalachian counties was roughly equal to that of the rest of the country. By 2017, however, the death rate for opioid overdoses in Appalachian counties was 72 percent higher than that of non-Appalachian counties (see Figure 1).

County leaders in Appalachia and across the country, who are on the frontlines of this epidemic, have often struggled to find effective approaches to addressing rising rates of addiction and overdose in their communities. This report aims to strengthen the local response to the opioid epidemic in Appalachia by presenting an analysis of its impacts on the region, followed by recommendations for local action. These recommendations are discussed in five sections: (1) leadership, (2) prevention, (3) recovery, (4) rehabilitation for justice-involved individuals and (5) economic development. Each recommendation section includes one or more case studies featuring an Appalachian county.

Figure 1: Age-Adjusted Opioid Overdose Death Rates, per 100,000 residents, 1999-2017



Source: NACo Analysis of Centers for Disease Control and Prevention, National Center for Health Statistics, Multiple Cause of Death 1999-2017 on CDC WONDER Online Database.

Note: Age-adjusted death rates were calculated by applying age-specific death rates to the 2000 U.S. standard population age distribution. Death rates are deaths per 100,000 population (age-adjusted).

The Nature of the Beast: The Opioid Economy in Appalachian Counties

Supply: Opioid Prescription Rates Higher in Appalachian Counties

The opioid epidemic has its roots in the growth of the prescription painkiller industry, starting in the 1990s, when medical practitioners began to more frequently rely on prescription medications to treat patients with acute and chronic pain. By the year 2000, medications for chronic pain relief had become a booming industry. The sheer volume of opioid prescriptions, alongside a lack of regulations and inadequate patient monitoring, contributed to an environment in which patients could easily abuse their prescriptions, and even those without a prescription could find opioids without much effort. Governing reported in 2017 that more than 50 percent of patients with opioid prescriptions ended up with leftover pills and 70 percent of people over the age of 12 who acquired pain relievers for non-medical use did so either by purchasing or stealing them from a friend or relative.²

In Appalachian counties, the abundant availability of prescription painkillers was even more pronounced than in non-Appalachian counties. In 2017, opioid prescription rates were 45 percent higher in Appalachian counties than in the remainder of the country, and rates have consistently remained at least that much higher since 2006 (see Figure 2).

120 100 80 60 40 20 Appalachian Counties Non-Appalachian Counties

Figure 2: Opioid Prescription Rates, per 100 residents, 2006-2017

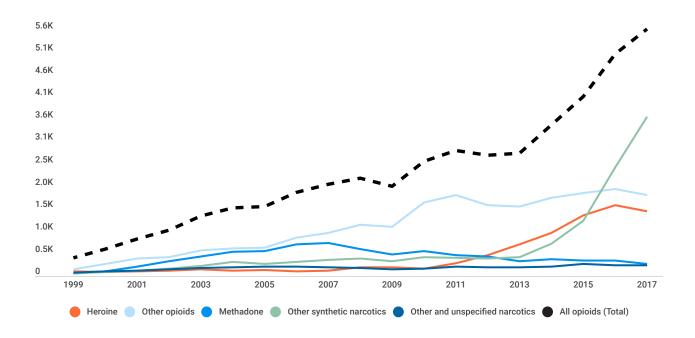
Source: NACo Analysis of Centers for Disease Control and Prevention data from IQVIA Xponent 2006–2017. Available at www.cdc.gov/drugoverdose/maps/rxrate-maps.html.

Demand: Residents Shifting to More Dangerous, Illegal Opioids

Following various national efforts implemented around 2010 by the U.S. Drug Enforcement Administration (DEA), American Pain Society and others to reduce opioid prescription rates,³ these rates decreased by roughly 30 percent nationwide from 2012 to 2017 (see Figure 2). As access to legal forms of the drug became more difficult, however, the demand for opioids continued to grow and shifted to more potent, illegal opioids, like heroin, fentanyl and other synthetic substances. Figure 3 illustrates the progression from prescription painkillers to illegal substances as prescription rates decreased.

From 1999 to 2011 the number of overdose deaths caused by prescription painkillers increased by 1,098 percent and remained the number one cause of opioid overdose death through 2015 (see Figure 3). From 2012 to 2017, however, while opioid prescription rates were decreasing and the number of prescription overdose deaths were leveling off, the number of overdose deaths caused by heroin increased by 211 percent, approaching the number of prescription overdose deaths by 2016. When fentanyl and other synthetic opioids arrived, the number of overdose deaths they caused rose by 816 percent during that same time period (2012 to 2017) and synthetic opioids became the leading cause of opioid overdose death in 2016. Even though the number of deaths caused by prescription painkillers and heroin dropped from 2016 to 2017, those caused by fentanyl and other synthetic opioid overdoses continued to grow tremendously, driving the continued increase of total opioid overdose deaths.

Figure 3: Total Opioid Overdose Deaths by Type of Opioid in Appalachian **Counties, 1999-2017**

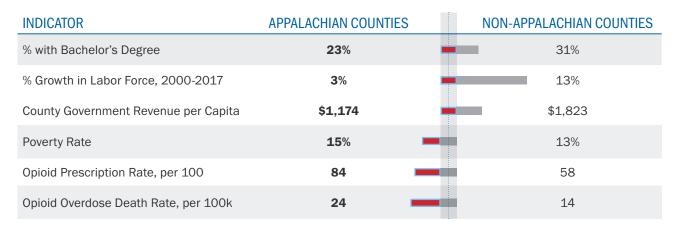


Source: NACo Analysis of Centers for Disease Control and Prevention, National Center for Health Statistics, Multiple Cause of Death 1999-2017 on CDC WONDER Online Database.

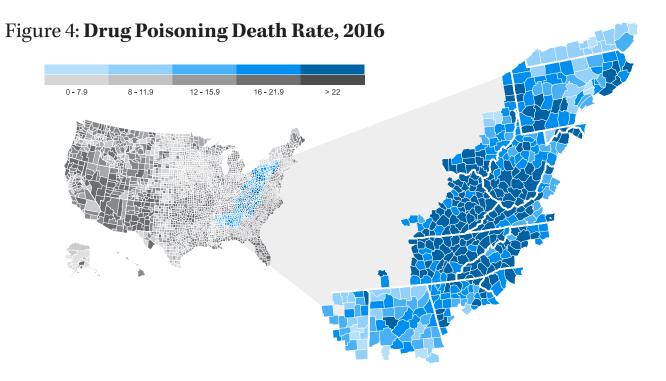
Note: Figure 3 shows the opioid overdose deaths by type of opioid for all counties in Appalachia that have these data available. In the graph, "other opioids" represents prescription opioids other than methadone; "other synthetic narcotics" represents illegal synthetic opioids, like fentanyl; and "other and unspecified narcotics" primarily represents types of opioids that have been mischaracterized.⁵

Life in Appalachia: Socioeconomic Indicators of the Region

Many socioeconomic factors have aggravated the opioid epidemic in Appalachian counties, such as poverty, poor health, low educational attainment and changes to the labor force. Although these factors did not necessarily cause the epidemic, they created an environment in which opioid misuse flourished in Appalachian counties more easily than in other parts of the nation, resulting in a crisis that has hurt both county residents and the county governments that serve them.



Note: The shaded area for each indicator is the lower value set as a baseline of comparison for the higher value.



Source: NACo County Explorer data, 2019. The Drug Poisoning Death Rate is the estimated number of deaths due to drug poisoning, including opioids, per 100,000 individuals, estimated into five increments.

Counties on the Frontlines: How the Opioid Crisis Impacts County Operations

County governments are on the frontlines of national efforts to reverse the opioid epidemic, funding justice, health, human services, economic development and other critical local services. As rates of opioid overdoses and deaths have increased, significant strain has been placed on county budgets and services. One study found that the cost of opioid misuse rose to over \$1,000 per capita in 2015 in 15 Ohio counties - most of which are in Appalachia.6

Appalachian counties, especially, are struggling with these additional costs because the region generally has fewer resources than other counties. In 2012, Appalachian counties generated 35 percent less revenue per capita (or, \$650) than non-Appalachian counties, and spent 38 percent – or approximately \$711 – less per resident than non-Appalachian counties.⁷ The declining coal industry in many Appalachian communities has further exacerbated these financial limitations by causing county governments to lose tax revenue that helps them fund numerous local services. Nevertheless, among other expenditures, Appalachian counties invested over \$5 billion in services for justice and public safety, nearly \$4 billion in health and hospitals, over \$3.2 billion in public welfare and over \$304 million in housing and community development programs in 2012.8 All of these costs have increased as a result of opioid misuse.

HOW AMERICA'S COUNTIES HELP FUND THE NATIONAL RESPONSE TO THE OPIOID EPIDEMIC

Health

Counties support over 900 hospitals with more than 58,000 beds. The average cost for an intensive care admission due to an opioid overdose was \$92.400 in 2015.9

From July 2016 to September 2017, there were over **142,500** emergency department visits due to suspected opioid overdose.¹⁰





Justice & Public Safety

Counties operate 91 percent of all local jails.

The average annual cost per incarcerated individual in a local jail was over \$47,000 in 2015.11 63 percent of sentenced jail inmates across the country have a substance use disorder. 12

Human Services

Counties invest more than \$58 billion in human services annually.

More opioid abuse in a county correlates to higher child welfare caseload rates and more severe cases.13

The interplay between homelessness and substance abuse is such that substance abuse can increase an individual's risk for homelessness, and vice versa.¹⁴



Source: NACo County Explorer data, 2019, unless otherwise noted.

What to Do Now:

Recommendations to County Leaders

1. Exercise Strategic Local Leadership **Key Actions:**

- a. Set a tone of compassion in local conversations on opioids
- b. Convene diverse stakeholders and faithbased organizations to form Opioid Task Forces
- c. Foster regional and intergovernmental cooperation

Case Study: Ross County, Ohio Case Study: Mercer County, W.Va.

2. Create and Strengthen Preventive and **Educational Initiatives**

Key Actions:

- a. Increase public awareness and facilitate safe disposal sites for opioids
- b. Conduct community outreach to children and families, particularly within the education
- c. Leverage data and technology to target services

Case Study: Allegany County, Md.

3. Expand Access to Addiction Treatments **Key Actions:**

- a. Increase the availability of and access to naloxone and medication-assisted treatments (MAT)
- b. Employ telemedicine solutions
- c. Encourage mental health treatment and counseling alongside addiction treatments

Case Study: Project Lazarus (Wilkes County, N.C.)

4. Implement a Criminal Justice Response to Illegal Opioid Sales and Provide Treatment and Services to Justice-Involved Individuals with Opioid Use Disorders

Key Actions:

- a. Reduce the illicit supply of opioids
- b. Facilitate treatment and workforce training in jails and upon reentry to reduce recidivism
- c. Connect people in recovery, including those involved in the criminal justice system, to housing and employment opportunities

Case Study: A New Beginning (Campbell County, Tenn.)

5. Mitigate Local Economic Impacts and **Consider New Economic Development Strategies**

Key Actions:

- a. Collaborate with high schools, educational institutions and businesses to align education and workforce training with shifting industry needs
- b. Leverage each county's strengths to attract and retain high-quality businesses, and help them learn to work with individuals in recovery
- c. Reinforce safety net services and expand education and employment opportunities for families experiencing cyclical poverty
- d. Expand entrepreneurial opportunities for county governments to make opioid recovery initiatives sustainable

Case Study: Coalfield Development Corporation (Lincoln, McDowell, Mingo and Wayne Counties, W.Va.)

Case Study: Housing Development Alliance (Perry County, Ky.)

I. Exercise Strategic Local Leadership

County officials are leaders in the community and are well-positioned to lead the effort against opioid misuse. They have authority and legitimacy from holding public office, and empathy and trust from daily community involvement. County leaders can also leverage relationships with businesses, community organizations and other governments to expand the network of resources available and help abate the opioid epidemic.

County officials are wellpositioned to lead the effort against opioid misuse.

Key Actions:

1. Set a Tone of Compassion in Local Conversations on Opioids

In many communities, the stigma associated with addiction encourages silence on the issue, often for fear of punishment – either by the justice system or by the community in social circles. County leaders can break the silence and stigma about addiction, set a tone of compassion and encourage solution-oriented discourse. By speaking openly about the crisis and listening to service providers and residents, county leaders can begin working with communities to develop more effective and inclusive solutions.

In a 2016 report on the local response to the opioid epidemic, The National City-County Task Force on the Opioid Epidemic stressed the importance of not only "speaking candidly and compassionately about the crisis in our cities and counties," but also of uplifting local efforts to overcome the opioid crisis as a means of setting a more positive and productive public narrative. The task force stated, in its report titled A Prescription for Action, "We must define our local struggles with the opioid crisis so that those struggles do not define our cities and counties."

ADDITIONAL RESOURCES

For county leaders wishing to start an open conversation with their residents about opioid use disorder, ARC developed a report, entitled, "Communicating About Opioids in Appalachia: Challenges, Opportunities and Best Practices."15 Governing also put together a guide for policy makers, entitled, "Confronting a Crisis: A Practical Guide for Policymakers to Mitigate the Opioid Epidemic."16

2. Convene Diverse Stakeholders and Faith-Based Organizations to Form Opioid Task Forces

County leaders are in a key position to pull local stakeholders – such as county agencies that help address the opioid epidemic (e.g., law enforcement and social services), community and business leaders or nonprofits and faith-based organizations – together to form Opioid Task Forces or other committees to address this issue. These groups foster community collaboration and can help with securing resources and coordinating services.

Jefferson County (Pa.) is one example of a county that is convening stakeholders and engaging residents through town hall meetings. The county brought in experts to talk with residents about how to identify those who are struggling with opioid addiction and connect them with appropriate treatment and services. ¹⁷ Likewise, the Heroin Coalition in Horry and Georgetown counties (S.C.) brings together various law enforcement agencies, nonprofits, churches and other stakeholders to lead the public conversation on the opioid epidemic, provide education to the community and increase the availability of recovery options.¹⁸

In many Appalachian communities, churches and faith-based organizations are a central part of life for residents. Relationships with these organizations can help strengthen community outreach efforts that increase awareness of the epidemic and available county services and programs. A 2018 report from ARC examined 10 counties the organization classified as "bright spot counties" – i.e., counties making substantial progress in improving public health - and found that many of their recovery programs were rooted in local churches and other faith-based groups.19

Throughout Erie County (Pa.), the Salvation Army and various local churches have taken a lead in working together to provide outreach to people in recovery for an opioid use disorder.²⁰ Outside of Appalachia, CHI St. Gabriel's Health in Morrison County (Minn.) is leading a prescription drug task force as well as a faith-based effort against opioid use disorder alongside several other county agencies.²¹

ADDITIONAL RESOURCES

The U.S. Department of Health and Human Services published a toolkit for county leaders interested in partnering with community and faith-based leaders, entitled, "Opioid Epidemic Practical Toolkit: Helping Faith and Community Leaders Bring Hope and Healing to Our Communities."22





3. Foster Regional and Intergovernmental Cooperation

The opioid crisis does not stop at any county boundary. Engaging surrounding counties, municipalities and other levels of government is necessary to secure additional resources and formulate a regional strategy.

The Tri-County Region Opioid Safety Coalition, consisting of Oregon's Clackamas, Multnomah and Washington counties, was formed in 2016. Convening officials in public health, public safety, behavioral health and patient communities, the Coalition coordinates county efforts in the region to increase access to treatment, bolster education for clinicians and the general public, compile data on regional trends and promote safe disposal and storage.²³ Similarly, various hospitals and human services agencies in Pennsylvania's Adams, Cumberland, Dauphin, Franklin, Fulton, Lancaster, Lebanon and York counties have all joined the South Central Pennsylvania Opioid Awareness Coalition. This regional partnership coordinates drug takeback events, hosts community forums and distributes valuable resources to inform the community.²⁴

Counties also coordinate programs and local agencies providing services to people with opioid use disorders. Lehigh County (Pa.) established a "Blue Guardian" program in which the county's justice and health departments collaborate. After a resident receives naloxone²⁵ for an overdose and returns home after hospitalization, a police officer conducts a home visit to discuss treatment options with the resident.²⁶ Cabell County (W.V.) has a similar program, where a "quick-response team" reaches out to residents after an overdose to help connect them to treatment options.²⁷

ADDITIONAL RESOURCES

For county leaders interested in participating in statewide initiatives to address the opioid crisis, the American Association of Nurse Anesthetists (AANA) compiled a list of these initiatives by state, available at: www.aana.com/practice/clinical-practiceresources/opioid-crisis-resources/Opioid-toolkit.²⁸

Case Study: Ross County, Ohio

2017 Population: 77.3k

2016 Median Household Income: \$44.6k

2017 Poverty Rate: 16%

2017 Age-Adjusted Opioid Overdose Death Rate (per 100k):

36 deaths

2017 Opioid Prescribing Rate, per 100 residents: 77

prescriptions

Source: NACo County Explorer data, 2019.

Located in south central Ohio, Ross County had Ohio's third highest overdose mortality rate, with 112 fatal overdoses in total between 2014 and 2016.29 Responding to this epidemic is Ross County's Hope Partnership Project (formerly known as the "Heroin Partnership Program"). Established in 2014, this multidisciplinary team of federal, state and local agencies tasked itself with building a comprehensive, community-based strategy to address the opioid crisis and its associated health- and justice-related impacts on the area.

Ross County also works closely alongside South Central Ohio Jobs and Family Services (SCOJFS), a state-supervised, county-administered arm of Ohio's human services system. SCOJFS provides public assistance, employment programs and child protective services to Ross, Hocking and Vinton counties. SCOJFS recently received a \$300,000 grant from the U.S. Department of Labor to assist dislocated workers. The grant will cover up to 50 percent of an employer's wage costs during on-the-job training and combine classroom instruction with hands-on training in community college apprenticeships. Finally, alongside its counterparts in Scioto and Montgomery counties, Ross County's Alcohol Drug Addiction and Mental Health Services Board is beginning a program funded by the state of Ohio that will reimburse employers for drug testing, train supervisors on how to manage individuals in recovery and establish a forum for information exchange among employers willing to hire individuals in recovery.

One challenge Ross County identified with its programs, however, is the lack of unrestricted grant fund-



Every court in **Ross County has** an embedded drug court.

ing. Stringent grant requirements can make it difficult to identify target populations and can limit the flexibility of the county to spend money and address new challenges as they arise. Nevertheless, Ross County has seen some encouraging results. For instance, nearly every first responder carries naloxone and is trained on its administration. Every court in Ross County has an embedded drug court. Most notably, opioid overdose deaths in Ross County declined from 44 to 33 in 2017 – the first year-to-year decrease since 2013.³⁰ For other counties, Mr. Jody Walker, SCOJFS Executive Director, and Mr. Rick Reynolds, SCOJFS Program Administrator, recommend a unified, combined effort among stakeholders.

Case Study: Mercer County, W.Va.

2017 Population: 59.8k

2016 Median Household Income: \$37.3k

2017 Poverty Rate: 21%

2017 Age-Adjusted Opioid Overdose Death Rate (per 100k):

2017 Opioid Prescribing Rate, per 100 residents: 102

prescriptions

Source: NACo County Explorer data, 2019.

Located in the heart of Appalachia, Mercer County (W.Va.) had an opioid overdose death rate of 54 people per 100,000 in 2017.31 But the county's addiction problem extends further than just opioids to other drugs, alcohol, smoking, vaping and gambling. Mercer County is losing much of its Appalachian culture to addiction: according to locals, older residents are no longer sitting out on their porches, sharing craft and folklore, and younger residents are no longer learning traditional skills, like woodworking or playing the guitar or banjo.

In response, Mercer County is leading initiatives to fight the opioid epidemic. As part of one initiative, the West Virginia School of Osteopathic Medicine in nearby Greenbrier County (W.Va.) developed an opioid-response toolkit, which Mercer County then adapted to its own specific situation to raise awareness around the issue of opioid misuse and to inform residents of ways they can help.³² Mercer County also worked with the West Virginia University School of Law to include a section on substance abuse in the county's latest comprehensive plan.³³

Mercer County Commissioner Greg Puckett has taken a lead role in addressing the crisis, directing a nonprofit organization, called "Community Connections," which serves as Mercer County's Family Resource Network. Based on the Community Anti-Drug Coalitions of America model to implement multiple behavioral change strategies, Community Connections provides technical assistance to 11 West Virginia counties (including Mercer County) for substance abuse prevention programs, educates county commissioners, periodically briefs county commissioners on tools to fight the opioid



crisis and holds special trainings for newly-elected officials. Community Connections also works closely with county agencies and schools on a variety of educational programs for students of all ages.

Separate from the work of local collaborations, Mercer County's justice and public safety officials are working on programs to divert individuals from the jail system using a drug court, a juvenile court, a teen (peer) court, a day report center and a Law Enforcement Assistant Diversion (LEAD) program, which works with Southern Highlands Community Health Center to connect justice-involved individuals with treatment. In addition, Mercer County, in partnership with neighboring counties, has recently initiated a Quick Response Team that follows up with individuals after an opioid overdose to help them find recovery options.

One major challenge Mercer County faces is a feeling of hopelessness resulting from the opioid crisis that leads some residents to a lack of care for their own properties and for the community. Mercer County's Commission responded with a volunteer strategy called, "Keep Mercer Clean," which won a NACo Achievement Award in 2018 for the way it mobilized the community for a thorough, county-wide spring clean-up.³⁴

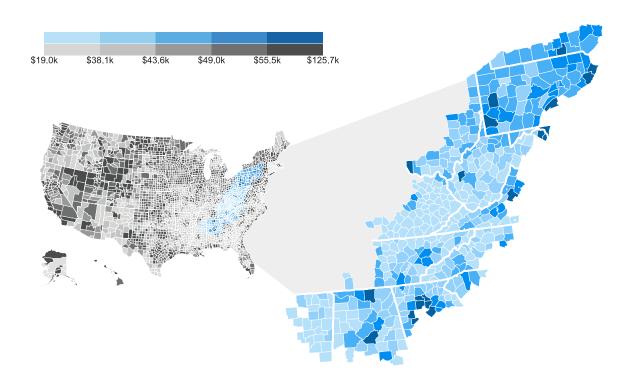
To other counties wishing to expand local efforts to address the epidemic, Commissioner Greg Puckett recommended learning about local community-based coalitions, then getting involved with and supporting their efforts. A good place to start may be working with Community Anti-Drug Coalitions of America to identify existing programs in the region.³⁵

II. Create and Strengthen Preventive and **Educational Initiatives**

Residents of Appalachian counties are economically disadvantaged compared with those who live in non-Appalachian counties. When ranking counties by 2016 median household income, more than three-quarters (77 percent) of Appalachian counties were in the bottom half nationwide (see Figure 5). Appalachian counties also had a poverty rate that was two percentage points higher than non-Appalachian counties in 2017 (15 percent vs. 13 percent, respectively). Substance use disorders tend to be more prevalent in impoverished communities due to a wide range of factors, including accident-prone employment and lower levels of social capital.³⁶ People living in poverty may also have less access to health care and drug treatment services, as well as stable, affordable housing and safe, meaningful jobs to assist them in their recovery.

The interplay between poverty and substance abuse impacts whole families and has multigenerational consequences. In 2017, one out of every five children (21 percent) in Appalachian counties lived in poverty.³⁷ For children, living in a household with parents or other family members who abuse drugs – such as opioids – can greatly increase the risk of childhood trauma and adverse childhood experiences. If left unaddressed, these adverse experiences can have a profound impact on an individual's life outcome, thus perpetuating cycles of multigenerational trauma, poverty and addiction.³⁸ Counties can formulate more effective solutions by considering the social determinants of health and economic development as part of a comprehensive plan to educate residents, prevent the spread of opioid use disorder and mitigate its long-term effects.

Figure 5: Median Household Income, 2016



Source: NACo Analysis of U.S. Census Bureau - American Community Survey (ACS) five-year estimates

Key Actions:

1. Increase Public Awareness and Facilitate Safe Disposal Sites for Opioids

As a first step, counties can educate residents about proper pill disposal and facilitate opportunities to dispose of medications safely. For example, the DEA organizes National Prescription Drug Take Back Days each Spring and Fall and provides public education materials to county governments.³⁹

Many counties already manage and promote access to safe disposal sites. The Erie County (N.Y.) Health Department collaborated with the Center for Health and Social Research at the State University of New York in Buffalo to create a map (called, "The Point") for residents to identify safe opioid disposal sites, needle exchanges and other resources for individuals with opioid use disorders and their families.⁴⁰ Cumberland County (Pa.) has 21 opioid drop-off boxes located throughout the county.⁴¹ King County's (Wash.) Opioid Task Force recommended engaging with local pharmacies to distribute mail-back envelopes for excess opioids. 42 Google Maps has even begun to include medication drop off sites in its maps, so a quick search can help residents find a location.⁴³

Counties can also engage medical doctors to share best practices for prescribing the smallest dosage of opioids possible and encourage them to use non-opioid methods to control pain. One resource available to counties and medical professionals is the Center for Disease Control and Prevention's (CDC) 2016 quidelines, which include

recommendations for deciding whether to initially prescribe opioids, prescribing the proper dosage amount and monitoring patients.44 Discretion should still be left to prescribing doctors who better know the medical needs of their patients, so as not to harm residents who need a higher dosage of opioids. 45 County leaders can also encourage pharmacies to use the Allied Against Opioid Abuse Pharmacy Toolkit, which provides tips for engaging with patients, monitoring their opioid use and safely prescribing the appropriate amount.46

ADDITIONAL RESOURCES

Nationwide Children's Hospital developed "The Opioid Education Toolkit: For Providers and Parents" with links for parents to help them talk with their children about prescription drug abuse, resources for prescribers to minimize the potential for addiction and educational tools regarding safe disposal of excess pills.47



Cumberland County, Pennsylvania has placed 21 medication drop boxes throughout its jurisdiction. Source: Cumberland County Website, 2019

2. Conduct Community Outreach to Children and Families, Particularly Within the Education System

Schools are a key point of contact to engage children and families on the risks of opioid misuse. Counties can work with schools to include curricula on opioid misuse. Counties and schools can also encourage parents to communicate openly with their children about the dangers of misusing opioids. Helping both parents and children identify family members who may be misusing opioids or other drugs should be a key objective. After outlining the problem, counties should also ensure that all residents know the services available and can connect a family member with treatment programs, family counseling or any other recovery service.

In McDowell County (W.Va.), teachers often serve as first responders in the community, working closely with the county's Department of Child Protective Services to reach children and young adults impacted by the opioid

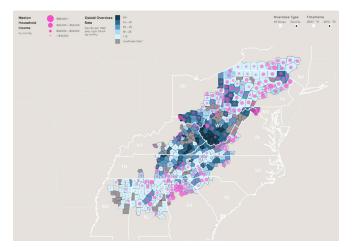
ADDITIONAL RESOURCES

To help local leaders communicate with young adults about the dangers of misusing opioids, the White House's Office of National Drug Control Policy (ONDCP) developed a "Youth Opioid Abuse Prevention Toolkit. 52" Teaching Tolerance developed a "Toolkit for The Opioid Crisis" to help teachers identify students with opioid-related trauma and provide them with the help they need to succeed academically.53 Maryland's Department of Education also developed a "Heroin and Opioid Awareness & Prevention Toolkit" with resources specific to educators at the high-school, middle-school and elementary-school levels, as well as for students and parents.54

crisis.⁴⁸ In Maryland, Anne Arundel County has been training school nurses and supporting staff to administer naloxone and stocking the medication in its schools.⁴⁹ Many other counties have been involved in educational initiatives in schools, including overhauling their D.A.R.E. (Drug Abuse Resistance Education) programs to focus on the opioid crisis.⁵⁰ Finally, the District of Columbia's school system includes seven school-based health centers that provide comprehensive primary care services to students, including substance abuse services.⁵¹

3. Leverage Data and Technology to Target Services

County leaders can collect data on opioid overdoses, opioid prescriptions and socioeconomic risk factors, among other indicators, to identify high-risk areas of the county and high-risk portions of the population. They can target their programs accordingly and provide additional resources to the people suffering most. Counties can also create data to track the county's progress toward identified goals more effectively. Counties can also use these data to build impactful advocacy efforts and become better positioned to apply for grant funding successfully.



ARC and NORC's Appalachian-specific map of the opioid crisis showing opioid overdose death rates and median household income. Available at http://overdosemappingtool.norc.org/

ADDITIONAL RESOURCES

The Opioid Mapping Initiative helps local leaders find data, map their data and ultimately harness the information to develop more strategic programs.⁵⁵ ONDCP also designed a program to map overdoses and naloxone applications at www.ODmap.org.56 NACo's County Explorer interactive mapping tool includes many county-level opioid-related datasets that local leaders can use to enhance their advocacy work at Explorer.NACo.org.⁵⁷ Finally, specific to Appalachia, ARC and the National Opinion Research Center (NORC) at the University of Chicago collaborated to build an Appalachia-specific map of the opioid crisis across counties, available at OverdoseMappingTool.NORC.org/.58

Case Study: Allegany County, Md.

2017 Population: 71.6k

2016 Median Household Income: \$41.6k

2017 Poverty Rate: 17%

2017 Age-Adjusted Opioid Overdose Death Rate (per 100k):

34 deaths

2017 Opioid Prescribing Rate, per 100 residents: 110 prescriptions

Source: NACo County Explorer data, 2019.

Around 2013, Allegany County Public Schools Superintendent, Dr. David Cox, and principals in the region noticed an increase in chronic absenteeism in a county that has traditionally had high attendance rates. Upon investigation, they discovered many of the absences were related to parents' opioid use. The number of opioid-related overdose deaths in Allegany County more than tripled between 2013 and 2017.59 Most of the people who were lost due to opioid overdoses were adults, but many children experienced trauma as a result of the loss of a parent or other family member, or as a result of a family member's opioid abuse.

The Allegany County Public School system works closely with the county sheriff and health department to address the crisis in an Opioid Overdose and Prevention Task Force. Together, they educate students about the dangers of opioid misuse by inviting residents in recovery to speak in health classes about opioid addiction and recovery services. Allegany County Sheriff Craig Robertson also speaks with both students and parents about this issue, presenting a "mobile bedroom" to show parents how to look for hidden drugs. Finally, the county centralizes information about county services for people with opioid use disorders online at PrescribeChangeAllegany.org.60

Overall, programs designed to combat the epidemic show promise: the number of overdose deaths fell 14 percent from 2016 to 2017.61 The widespread availability of naloxone throughout the county and its school system has likely also helped save the lives of residents who may have otherwise suffered a fatal overdose. Having doctors who overprescribe is still a huge challenge for the county, so the health department is working hard to educate doctors using the CDC's 2016 guidelines and



"Listen to the stories of people in recovery to understand addiction and how it affects the brain."

- Dr. David Cox, Superintendent, Allegany County Public Schools, Md.

succeeded in reducing the county's opioid prescription rate by 14 percent from 2016 to 2017, though the prescription rate remains the highest in the state.⁶²

Allegany County also has programs designed to reduce the stigma associated with addiction, which often prevents those with opioid use disorder from asking for help. The county has an ongoing educational campaign for residents about recovery services and the nature of addiction. For other counties, Dr. Cox emphasized the importance of listening to the stories of people in recovery to understand addiction, how it affects the brain and how individuals often use opioids to avoid the crippling effects of withdrawal and function properly, not necessarily to get high.

III. Expand Access to Addiction Treatments

Finding ways to combat substance abuse effectively is challenging because even after rehabilitation, relapse often occurs and can be part of the lifelong recovery process. One study found that relapse rates for drug addiction are similar to those of other chronic diseases, like diabetes or asthma (40-60 percent)⁶³ – though other studies have found much higher relapse rates (from 72 to 88 percent after 12 to 36 months).⁶⁴ Recovery programs can obtain higher rates of success by incorporating wraparound services to address the entirety of the person's needs and by focusing on both short- and long-term success.

Wraparound services, such as physical and mental health services, are critical to meeting the needs of those in recovery. A 2018 study found that people who use opioids reported having worse physical and mental health, and that the severity of their opioid use disorder increased with the severity of a mental illness. 65 In 2017, ARC reported that residents in Appalachian counties are less healthy - physically and mentally - than those in counties outside of Appalachia, measured by a variety of indicators, such as obesity, diabetes, depression and suicide. 66 Appalachian residents also reported 14 percent more physically and mentally unhealthy days than the country as a whole.⁶⁷ Incorporating physical and mental health components into any county program to address addiction may help increase its effectiveness.

Key Actions:

1. Increase the Availability of and Access to Naloxone and Medication-Assisted Treatment (MAT)

The U.S. Food and Drug Administration (FDA) has approved a variety of medications for providing treatment to individuals in recovery from opioid use disorders. Counties can better address opioid use disorder by viewing it as a chronic disease and offering more than one of type of these medications to best meet the needs of residents in recovery, while ensuring that physicians and other first responders have the resources they need to administer these medications when appropriate.

For recovery from an overdose, naloxone is a life-saving medication designed to rapidly reverse the fatal effects of an opioid overdose. The FDA has approved three methods to administer naloxone: (1) injection by a professional physician, (2) a prefilled auto-injection device, called EVZIO® and (3) a prepackaged nasal spray, Narcan®.68 Counties can help equip emergency personnel, law enforcement officials, pharmacies, social service workers, educators, doctors and even individual residents with naloxone, then organize trainings on how to detect an overdose and use naloxone to save lives.

For recovery from addiction, multiple studies have demonstrated the effectiveness of medication-assisted treatment (MAT).⁶⁹ Opioids can interact with the brain to create a physiological dependence, often resulting in painful withdrawal symptoms that individuals avoid by continuing to use opioids. The drugs used in MAT mimic the physiological effects and/or block the euphoric effects of opioids, which helps to mitigate the pain of withdrawal and allow the person to focus on recovery. MAT drugs can come in three forms: methadone, buprenorphine and naltrexone. Physicians prescribe one of these medications based on an individualized assessment of the patient's circumstances, such as severity of addiction, pregnancy, mental illness, incarceration, chronic pain and other factors. MAT is most effective when paired with counseling or therapy as part of a "whole-person treatment" method. 70

MAT faces some barriers, however, such as a lengthy physician certification process for some forms of MAT, and the stigma associated with opioid addiction. As a result, less than half (41 percent) of all substance abuse treatment facilities nationwide offer at least one form of MAT.⁷¹ Counties can help by providing incentives for doctors to obtain their MAT certification, and by educating residents and physicians on how addiction affects the brain and how MAT and naloxone work to counter those effects.

Many counties are incorporating naloxone and MAT into their services. In Charleston County (S.C.), the county's drug and treatment facility administers all three types of MAT drugs and provides a full continuum of care for residents in recovery. The county also partners with the Medical University of South Carolina on an expedited process for individuals diagnosed with opioid use disorder at a hospital versus when seeing a primary care

ADDITIONAL RESOURCES

The Legal Action Center developed a MAT Advocacy Toolkit that explores many potential legal issues with MAT, provides resources for people participating in MAT and offers recommendations for reducing barriers to MAT.77

physician or other doctor to receive MAT.72 Suffolk County (N.Y.) implemented workshops to train residents on preventing overdose deaths using Narcan®.73 In Pennsylvania, Armstrong County emergency personnel carry a supply of Narcan® and the county trains these personnel how to help connect people to treatment options after an overdose.⁷⁴ Allegheny County (Pa.) offers Narcan[®] kits to people being released from jail.⁷⁵ Wyoming County (N.Y.) invests in mobile units to transport individuals seeking help to treatment centers.⁷⁶

2. Employ Telemedicine Solutions

In many counties, distance and access to transportation are huge barriers to receiving services. To overcome transportation barriers, counties can partner with hospitals and universities to provide telemedicine services, such as virtual counseling and MAT, as well as remote training for doctors and other physicians located closer to residents. One study found no difference in outcomes between patients receiving buprenorphine via video conference and those receiving buprenorphine face-to-face.⁷⁸

In the state of Virginia, three universities offer remote sessions every two weeks to discuss topics such as effective opioid abuse treatment methods and advice for providing therapy to people in recovery.⁷⁹ Mercer and McDowell counties (W.Va.) contract with West Virginia University's Comprehensive Opioid Addiction Treatment (COAT) telepsychiatry program to remotely deliver treatment and therapy.80

Various Appalachian counties have received grants to support the expansion of telemedicine programs, including Mercy Health in Ohio, which uses its grant to provide virtual behavioral health consultation services to Brown and Adams counties.81 Other Appalachian counties in Pennsylvania, Virginia, Kentucky, North Carolina and New York received similar grants.82

3. Encourage Mental Health Treatment and Counseling Alongside Addiction Treatments

Many people with opioid use disorders also have co-occurring mental illnesses: in one study, 80 percent of patients receiving methadone treatment also had a psychiatric disorder.83 Research shows that MAT and other treatment options are most effective when combined with counseling and therapy services,84 for the opioid crisis is, indeed, also "a mental health crisis." 85 Counties can encourage recovery programs to adopt an integrative care model which,

alongside MAT, provides a number of wraparound services, such as: counseling, case management, housing, psychiatric evaluations and treatments, occupational therapy, vocational training and family engagement, among others.86

As one example, in recognition of the crossover in needs, Lawrence County (Pa.) transformed its drug court to allow people with co-occurring opioid use disorders and mental illnesses to access multiple types of treatment.87

ADDITIONAL RESOURCES

County leaders can commit to better addressing the mental health treatment needs of people involved in the justice system by joining the national **Stepping** Up initiative to reduce mental illness in jails and receive additional resources from NACo, The Council of State Governments Justice Center and the American Psychiatric Association Foundation. Sign up today at www.NACo.org/SteppingUp.88

Case Study: Project Lazarus (Wilkes County, N.C.)

2017 Population: 68.6k

2016 Median Household Income: \$34.8k

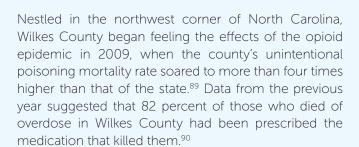
2017 Poverty Rate: 19%

2017 Age-Adjusted Opioid Overdose Death Rate (per 100k):

33 deaths

2017 Opioid Prescribing Rate, per 100 residents: 79 prescriptions

Source: NACo County Explorer data, 2019.



In response, Wilkes County is leading a community-based response that includes a Substance Abuse Task Force (SATF). SATF is a coalition of local health providers, community members and county officials that educates the community on proper narcotic prescription utilization, handling and disposal. At the same time, the Chronic Pain Initiative (CPI), which was implemented by the state's regional Medicaid authority, trains primary care physicians on how to identify those at risk of overdose and safely prescribe opioid medications.

At the heart of Wilkes County's progress, however, is Project Lazarus: a nonprofit organization established in 2007 that focuses on improving and coordinating community-based efforts to reduce prescription opioid overdoses. Project Lazarus was developed from the efforts of both the SATF and the CPI at the time when Mr. Fred Wells Brason II, the current CEO of Project Lazarus, was the Chair of the SATF and the Project Director for the CPI. Using a bottom-up approach to coalition building, Project Lazarus offers training and technical assistance to stakeholder organizations. Additional programs are available to help educate medical professionals on proper pain management and substance abuse treatment. Staff also lead pill disposal initiatives. In addition, the project seeks to enhance recovery services that include counseling and peer support. It leads prevention programs in schools designed to identify risks and pro-



Between 2009 and 2010, Wilkes County's opioid overdose death rate dropped 42 percent, emergency admissions fell 15 percent and physician utilization of prescription monitoring programs increased to 70 percent.

mote resiliency, works with law enforcement and court diversion efforts and promotes community access to naloxone.

As a result of these efforts, between 2009 and 2010, Wilkes County's opioid overdose death rate dropped 42 percent, emergency admissions fell 15 percent and physician utilization of prescription monitoring programs increased to 70 percent, compared to 20 percent statewide.91 The Project Lazarus model has been replicated elsewhere, and other North Carolina counties that implemented it generally recorded a 26 percent drop in substance use related emergency department visits.92 Mr. Brason argues that the biggest determinant of program effectiveness is the presence of a local champion who sustains leadership and supports community mobilization.

IV. Implement a Criminal Justice Response to Illegal **Opioid Sales and Provide Treatment and Services** to Justice-Involved Individuals with Opioid Use **Disorders**

The incarceration of people who are addicted to opioids has created a situation where many jails - most of them operated by counties - become de facto detoxification centers. Nationally, 63 percent of sentenced jail inmates across the country have a substance use disorder.93 Research shows that people who used opioids are more likely to become involved with the criminal justice system, and this likelihood increases with their opioid usage.94

Local law enforcement and corrections officials play a key role in not only disrupting the supply chain of illicit opioids, but in helping individuals begin the recovery process. Often, an encounter with law enforcement or a jail booking is the first time a person is identified as having an addiction. County officials have the opportunity to make a positive impact on people with opioid use disorders through recovery services both before and after they become involved in the justice system through law enforcement diversion efforts, in court, in jail and upon release.

County officials have the opportunity to make a positive impact on people with opioid use disorders through recovery services both before and after they become involved in the justice system.

Key Actions:

1. Reduce the Illicit Supply of Opioids

Alongside reducing demand for illegal opioids, one priority for law enforcement is curbing the supply of them in the community. County law enforcement can crack down on people selling illegal opioids and work with physicians, pharmacists and the community to monitor opioid prescriptions and report physicians who are overprescribing.

In conjunction with efforts to reduce the supply of legal opioids discussed in the second recommendation section, county law enforcement officials should continue working to disrupt the supply of illegal opioids, like heroine and fentanyl. County leaders can work to engage the community and help law enforcement officials identify supply chains and arrest suppliers. They can also take advantage of the data available (as mentioned above in the second recommendation section) to identify areas with high levels of illicit opioid activity. Counties can also facilitate partnerships between justice and health agencies to train law enforcement officials to identify various types of opioids, how to safely handle them and how to use naloxone to revive people experiencing an opioid-related overdose.

2. Facilitate Treatment and Workforce Training in Jails and Upon Reentry to Decrease Recidivism

Within the first two weeks after release from jail, people with opioid use disorders are 40 times more likely than the general population to fatally overdose on opioids and 74 times more likely to die of a heroin overdose due to changes in their tolerance of the drugs since being incarcerated.95 Yet, in 2018, only 20 state corrections agencies offered MAT in their drug treatment programs and fewer than 200 county and other local jails in 30 states did the same.96

Encouragingly, counties are increasingly developing MAT programs inside their jails (see the third recommendation section for a discussion of MAT). For example, Dane County (Wis.), Kenton County (Ky.) and Lake County (Ill.) have all developed programs to offer Vivitrol[®] (a form of naltrexone) in their jails.⁹⁷ Snohomish County (Wash.) offers suboxone (a medication that combines buprenorphine and naloxone) in jails, 98 Bernalillo County (N.M.) offers methadone⁹⁹ and both Spokane County (Wash.) and Hamilton County (Ohio) offer buprenorphine.¹⁰⁰ Finally, to help prevent overdoses after a person returns to the community, a number of counties hand out naloxone as part of the jail release process, including: Durham County (N.C.),101 Cook County (III.),102 Clackamas County (Ore.),103 Philadelphia City and County (Pa.)¹⁰⁴ and Nash County (N.C.).¹⁰⁵

Employment is also critical for a person's recovery, particularly as they are leaving the jail system. Individuals who become involved in the justice system face the potential of losing their jobs while in custody and many experience when barriers seeking employment after release. Applicants with a history of drug-related offenses are less likely to be offered interviews and, as a result, less likely to be hired. Having meaningful employment not only helps with basic needs such as housing, food and transportation, but it can give purpose to a person's life. Counties can work with individuals before they leave jail to prepare them for finding and obtaining employment while fostering their recovery. Many jails offer employment readiness training, and some allow individuals to search for jobs online before they are released. Others offer work-release programs where an individual leaves the jail to work during the day and returns at night.

Having meaningful employment not only helps with basic needs such as housing, food and transportation, but it can give purpose to a person's life.

ADDITIONAL RESOURCES

The National Sheriffs Association developed a guide to administering MAT in jails that county leaders can use to aid their efforts, entitled, "Jail-Based Medication Assisted Treatment: Promising Practices, Guidelines and Resources for the Field."107

The National Institute of Corrections created a webpage where they gathered resources to help corrections professionals improve employment programs for people involved in the justice system, called, "Transition and Offender Workforce Development."108

3. Connect People in Recovery, Including Those Involved in the Criminal Justice System, to Housing and Employment Opportunities

Alongside treatment options and workforce training in jails, it is essential that people receive wraparound services upon release in coordination with their probation and parole officers. Often, the situation people found themselves in before incarceration played a large role in their involvement in the justice system. Numerous studies have, therefore, demonstrated the importance of being able to obtain meaningful employment and quality housing in reducing recidivism. 109 Counties can also work to develop innovative transportation options for those in recovery, especially in rural communities, such as reduced fares for public transportation or partnerships with ride-sharing services, like Uber or Lyft. Moreover, counties can examine shortages in their own government workforces and develop programs that meet these needs by hiring formerly incarcerated residents and providing recovery services alongside employment.

As one example, the Southwest Virginia Advanced Manufacturing Center of Excellence is participating in a pilot program with county judicial and corrections systems to teach welding to people in jails and link them to recovery services and employment opportunities even before they are released. 110 Kenton County (Ky.) developed a 12-step reentry program that includes six months of aftercare and job training.¹¹¹ In Ohio, Hamilton County created a job training reentry program for women with opioid use disorder in the jail system.¹¹² Also in Ohio, Cuyahoga County's jail works with the county's Jobs and Family Services agency to review inmates' Medicaid eligibility and connect them with health care providers. The county also provides free Uber rides to help people recently released from jail pick up prescriptions or go to doctor appointments. 113 Finally, in Chesterfield County (Va.), the Sheriff's Department works with the Department of Behavioral Health and Developmental Services to offer a 72-hour course to current and former inmates to become certified peer support specialists and work with individuals involved in opioid treatment programs, like the county's Heroin Addiction Recovery Program (HARP).¹¹⁴



Case Study: A New Beginning (Campbell County, Tenn.)

2017 Population: 39.6k

2016 Median Household Income: \$33.6k

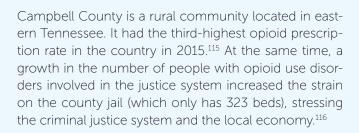
2017 Poverty Rate: 19%

2017 Age-Adjusted Opioid Overdose Death Rate (per 100k):

26 deaths

2017 Opioid Prescribing Rate, per 100 residents: 172 prescriptions

Source: NACo County Explorer data, 2019.



A New Beginning – an innovative jail-to-jobs program that connects formerly incarcerated individuals to local employers - is at the center of Campbell County's response to the epidemic. Immediately upon release from jail, applicants go through a screening process, then partake in a two-week process in which A New Beginning starts integrating them back into the community by ensuring their basic needs are met and getting them started with establishing income by paying them minimum wage to take a life skills course, alongside an optional Bible study course. Resources such as weekly drug tests, mentor consultations and meetings with Celebrate Recovery or a Narcotics Anonymous group ensure individuals remain engaged in treatment. After the initial two-week phase, participants begin working full-time at a factory making \$10 per hour. Over the subsequent six months, participants receive specialized on-the-job training, one-on-one financial counseling and, if needed, GED coursework. After six months, A New Beginning staff help identify full-time, permanent job placements.

A New Beginning enrolled 92 participants during the first 14 months of its operation (2017-2018) - 27 of whom were able to successfully finish the program and find meaningful job placement afterwards. Unfortunately, many program participants suffered one or more relapses, which is a challenge for virtually every treat-



"Use a holistic approach to link employment to recovery and provide comprehensive wraparound services."

- Mr. David Bosch, Director and Mrs. Stacy Bosch, Assistant Director, A New Beginning

ment program, since many participants went back into the same environments that contributed to their initial substance abuse without adequate wraparound services. Another challenge was that program participants often had to choose between a class, an appointment or their work schedule. When asked to share advice with other county leaders, Mr. David Bosch, Director, and Mrs. Stacy Bosch, Assistant Director, recommend using a holistic approach to link employment to recovery and provide comprehensive wraparound services.

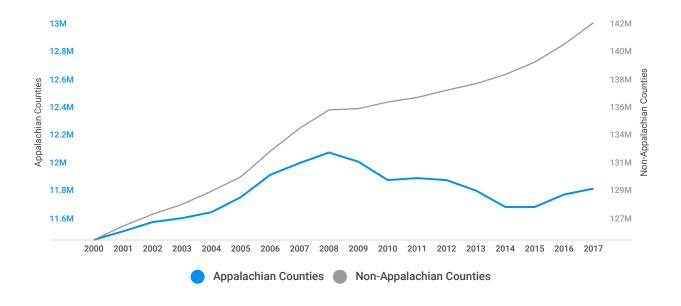
V. Mitigate Local Economic Impacts and Consider **New Economic Development Strategies**

The economic impacts of the opioid epidemic have been tremendous. One report showed that, between 1999 and 2015, opioids reduced labor force participation by 2 million workers, yielding a cumulative loss of \$1.6 trillion to the U.S. economy. The largest negative effects occurred in Appalachian states, such as Georgia, New York, Kentucky and West Virginia, as well as in Arkansas and Missouri. 117

In Appalachia, specifically, the diminution of the labor force presents a clear picture of the economic struggles occurring alongside the opioid crisis. From 2000 to 2008, the labor force in Appalachian counties grew by 5.5 percent – 3.6 percentage points lower than that of other counties (which grew by 8.1 percent). From 2008 to 2017, however, the labor force in Appalachia decreased by 2.1 percent overall following the Great Recession, while that of the rest of the country increased by 5.1 percent (see Figure 6). This decrease in the labor force represents, in part, residents who stopped looking for employment, whether due to retirement, injury or discouragement in the work force.

A 2017 study by the Brookings Institution found evidence that labor force participation rates fell in counties where more opioids were prescribed.¹¹⁸ When the authors of that study combined labor force participation decreases with increases in opioid prescriptions, their resulting map revealed a concentration of this problem in central and southern Appalachia. 119 Whether the correlation between decreases in the labor force and increases in opioid overdose deaths are causal or coincidental is still unclear; 120 nevertheless, county leaders must consider the importance of workforce development in conjunction with recovery services to alleviate the effects of the economic downturn happening alongside the opioid crisis in Appalachia.

Figure 6: Total Civilian Labor Force, 2000-2017



Source: NACo Analysis of Bureau of Labor Statistics - Local Area Unemployment Statistics (LAUS), 2000-2017

Note: The two graphs have been given a comparable scale, with the year 2000 as a base value for both, and the top of each vertical axis as 1.15 times that base value. A county's labor force includes both employed residents and unemployed residents who are actively looking for a job.

Key Actions:

1. Collaborate with High Schools, Educational Institutions and Businesses to Align Education and **Workforce Training with Shifting Industry Needs**

County leaders often convene business leaders to learn about their specific workforce needs, then work with high schools, technical schools and colleges to develop strategic workforce education initiatives. Counties can also facilitate partnerships between industries and schools to connect educational programs directly with employment opportunities.

In Appalachian counties, accident-prone industries accounted for 26 percent of total employment in 2016 - four percentage points higher than the U.S. as a whole (22 percent).¹²¹ Major injuries in the workplace or elsewhere may lead doctors to prescribe painkillers, like opioids, as part of recovery. County leaders can consider what types of industries and jobs dominate their county's economy, and develop strategies to mitigate work-related risks of injury, such as expanded training programs in partnership with universities and businesses.

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2. Leverage Each County's Strengths to Attract and Retain High-Quality Businesses, and Help Them Learn to Work with Individuals in Recovery

Two major challenges for many Appalachian communities are: (1) finding and retaining workers who can pass drug tests and (2) finding businesses willing to hire or retain individuals in recovery because of the social stigma. Counties can develop programs to help businesses implement preventive interventions for their employees and teach them how to help employees through recovery. According to one study, it can cost an average company between 25 percent and 200 percent of an employee's annual compensation to replace him or her, not including lost institutional knowledge or lost co-worker productivity, so helping workers through the treatment process could help the business save money. 122

In Fulton County (Pa.), Fulton Behavioral Health Services began a project called Workforce Dignity, which connects people in recovery with a local manufacturing company. To ease the potential risks to employers, Fulton County programs support strengthen workers with a team consisting of a licensed clinical social worker, a therapist, a certified recovery specialist and a probation and/or parole officer.¹²³

County leaders can also help mitigate the economic effects of the opioid epidemic by attracting and retaining businesses that provide economic opportunities for residents, especially those in recovery. County leaders are in a position to bring stakeholders together to revitalize the community and make it an attractive place to live and to work. In Washington County (Md.), for example, the city of Hagerstown developed a 10-year economic plan to rebuild the city amidst the downturn caused by the opioid epidemic, which includes renovating the downtown area, building new open spaces and expanding cultural and educational institutions.124

ADDITIONAL RESOURCES

The National Safety Council (NSC) developed a toolkit for employers to deal with the opioid crisis and its effects in the workplace, called, "The Proactive Role Employers Can Take: Opioids in the Workplace."125 Employers can see an estimated cost of substance use to different types of companies based on size, industry and state using NSC's substance use calculator. 126 The National Business Group on Health also developed a toolkit for employers responding to employees with any kind of substance abuse, called, "An Employer's Guide to Workplace Substance Abuse: Strategies and Treatment Recommendations."127



3. Reinforce Safety Net Services and Expand Education and Employment Opportunities for Families **Experiencing Cyclical Poverty**

Services for children and families are a critical component of responding to the opioid epidemic and breaking cycles of multigenerational poverty and substance abuse. Early childhood development programs should focus especially on preventing childhood trauma and supporting maternal health. One study found evidence of a connection between rates of neonatal abstinence syndrome - a form of withdrawal experienced by a newborn whose mother misused opioids - long-term unemployment rates and shortages of mental health clinicians across counties. 128 For older children, educational initiatives should aim to reduce absenteeism so children do not fall behind their peers. Impactful programs also connect youth to employment opportunities or higher education upon completion of high school.

Services for children and families are a critical component of responding to the opioid epidemic and breaking cycles of multigenerational poverty and substance abuse.

To address the uptick in children entering foster care, Ohio counties are piloting various efforts to expand safety net services. In fact, voters in 48 Ohio counties have approved initiatives containing levies to increase funding for services for children.¹²⁹ Lake County, for instance, requires county property owners to pay an additional \$14 annually per \$100,000 valuation, an effort expected to raise \$400,000 in response to rising foster care costs.¹³⁰ Fourteen other counties in Ohio are now receiving grants under the state's Sobriety, Treatment and Reducing Trauma (START) program, which connects children with child protective services, peer mentors, courts and behavioral health and treatment providers. 131

In Washington, King County identifies the opioid crisis as a root cause of homelessness. To simultaneously address homelessness and opioid addiction, one city in King County (Bellevue), is working closely with the county and partnering with with local community providers to provide a wide array of services to individuals experiencing homelessness, such as mental health resources, job training programs, housing assistance, addiction treatment, counseling and life coaching. Other practices utilized in King County include promoting and preserving access to affordable housing, childcare, transportation, health care and emergency rent and energy assistance.

4. Expand Entrepreneurial Opportunities for County Governments to Make Opioid Recovery **Initiatives Sustainable**

The opioid crisis has created or expanded various needs in the market on which counties may be able to capitalize, thus developing programs that fund themselves without much taxpayer funding. Counties can also partner with private companies to ensure better delivery and monitoring of these services. By initiating a procurement process, counties can select the best service provider – whether private, nonprofit or public.

Private industry can play an important role in supporting county efforts to combat the opioid epidemic. Some companies are hiring people in recovery as employees, some are developing innovative treatment and therapy options and others are creating new monitoring methods for individuals or communities. 132 One startup company, called "Groups," targets towns with fewer than 10,000 residents to set up basic operations that provide MAT and group therapy to people with opioid use disorders for \$65 per week.¹³³ Counties may be able to replicate similar types of programs in other communities, or partner with these companies to bring their services to residents.

Case Study: Coalfield Development Corporation (Lincoln, McDowell, Mingo and Wayne Counties, W.Va.)

2017 Population:

Lincoln County: 20.8k McDowell County: 18.5k

Mingo County: 24.1k Wayne County: 40.2k

2016 Median Household Income:

Lincoln County: \$36.2k McDowell County: \$25.2k Mingo County: \$32.4k Wayne County: \$38.3k

2017 Poverty Rate:

Lincoln County: 26% McDowell County: 32% Mingo County: 31%

Wayne County: 20%

2017 Age-Adjusted Opioid Overdose Death Rate (per 100k

residents):

Lincoln County: 50 McDowell County: 74 Mingo County: 65 Wayne County: 69

2017 Opioid Prescribing Rate,

per 100 residents:

Lincoln County: 42 McDowell County: 88 Mingo County: 75 Wayne County: 62



Source: NACo County Explorer data, 2019

More than a decade's worth of mine closures, workplace injuries, increasing addiction and rising incarceration rates have left many West Virginia residents unemployed. Many attempts at job training ignore the reality that there are fewer job opportunities, which is a result of the region's long-standing dependence on manufacturing, coal and mining. 134

To address this challenge, Coalfield Development Corporation is working to revitalize Wayne, Lincoln, Mingo and McDowell counties by offering on-the-jobtraining to unemployed and underemployed individuals in various social enterprises. Coalfield accepts referrals from various treatment programs, and roughly half of its participants are either in recovery or are impacted by the addiction of family members.

A \$2 million grant from ARC supports Coalfield's SEED-LIFT program. The program seeks to diversify local economies by building a framework for private investment in different industries - namely, construction, agriculture, arts and recreation, woodworking and solar panel installation. Crew members are immersed in Coalfield's 33-6-3 workforce development model, which incorporates 33 hours of paid work, six hours of college courses and three hours of mentorship in personal development.

The program has a network of counseling services for program participants and an emergency loan program.

Coalfield's training program boasts an 83 percent graduation rate.135 In just one decade, the social enterprise has formed five new businesses, created 60 on-the-job training positions, provided 200 professional certification opportunities and revamped 150,000 square feet of dilapidated property into affordable housing projects, community centers and coffee shops. While various grants allow Coalfield to increase hiring and scale up projects, its steady stream of profits keep the program self-sustaining.

Coalfield faces numerous challenges in balancing business needs with employee needs, so it can continue to create new jobs and retain existing ones, without becoming so competitive that it pushes private businesses out of the community. When asked what lessons she would share with other county leaders, Ms. Marilyn Wrenn, Chief Development Officer for Coalfield Development, advised that they partner with other governments and organizations that are doing similar work. For her, providing opportunities for paid, meaningful work is a key part of any recovery program, and communication between employees in recovery and employers is essential.

Case Study: Housing Development Alliance (Perry County, Ky.)

2017 Population: 26.6k

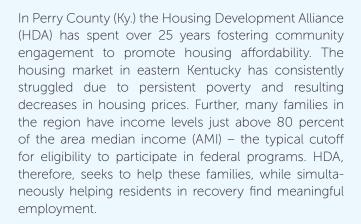
2016 Median Household Income: \$31.6k

2017 Poverty Rate: 26%

2017 Opioid-Related Overdose Deaths: 29 deaths 2017 Opioid Prescribing Rate, per 100 residents: 199

prescriptions

Source: NACo County Explorer data, 2019.



Funded by a Partnerships for Opportunity and Workforce and Economic Revitalization (POWER) grant from ARC, the HDA's Hope Building program plans to hire recovering opioid users to build affordable housing for households with incomes between 80 percent and 120 percent of the AMI. Once referred by the Perry County Drug Court or Hickory Hills Recovery Center, participants will work for HDA four days per week and take one day of classes in technology and construction at a local community or technical college. In addition to acquiring technical certificates, enrollees will earn half the progress toward an associate degree if they stay in the program for the full year. Throughout their time in the Hope Building program, participants will receive transportation to and from work, as well as counseling and support services.

One major challenge that HDA has faced is that the housing market has not provided residents making just over 80 percent of the AMI with many options, so HDA must develop a new market and encourage residents who could not previously afford a single-family home to become homeowners. The POWER grant will help by covering a portion of the labor costs for three years,



"Build out your network of partnerships, so you can rely on the expertise of others."

- Mr. Scott Reynolds, Executive Director, Housing Development Alliance

which HDA hopes will be enough time to spur the local housing market through home construction, thus providing a steady stream of revenues from the construction and sale of other homes for similar programs to be self-sufficient. Perry County's agencies work closely with HDA to aid home construction by waiving certain fees, adopting new roads built to connect housing units and advising HDA on where to find land suitable for development. For other county leaders wishing to develop a similar program, Mr. Scott McReynolds, Executive Director of HDA, recommends that they build out their network of partnerships, so they can rely on the expertise of others, as HDA relies on the expertise of its partners who work in addiction recovery.

Endnotes

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About NACo

The National Association of Counties (NACo) unites America's 3,069 county governments. Founded in 1935, NACo brings county officials together to advocate with a collective voice on national policy, exchange ideas and build new leadership skills, pursue transformational county solutions, enrich the public's understanding of county government and exercise exemplary leadership in public service.

About ARC

Established in 1965, the Appalachian Regional Commission (ARC) is a regional economic development agency that represents a partnership of federal, state and local government. ARC's mission is to innovate, partner and invest to build community capacity and strengthen economic growth in Appalachia to help the region achieve socioeconomic parity with the nation.

For more information:

www.NACo.org/OpioidsInAppalachia

NACo contact: Jonathan Harris at jharris@naco.org

ARC contact: Brittany Jones at bjones@arc.gov

