

INSTITUTE FOR YOUTH, EDUCATION, AND FAMILIES

> Opioid Use Disorder: City Actions and Opportunities to Address the Epidemic

> > **NLC MAYORS' INSTITUTE**

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INSTITUTE FOR YOUTH, EDUCATION, AND FAMILIES

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The NLC Institute for Youth, Education, and Families helps municipal leaders act on behalf of the children, youth and families in their communities. NLC launched the YEF Institute in January 2000 in recognition of the unique and influential roles that mayors, city councilmembers and other local leaders play in strengthening families and improving outcomes for youth and children.

#### **About the Authors**

This paper was authored by the GWU Milken School of Public Health, under the leadership of Katie B. Horton, RN, MPH, JD, and with staff including Naomi Seiler, JD, Greg Dwyer, MPH and Anya Vanecek, MPH. NLC staff contributing to this summary include Sue Pechilio Polis, Jim Brooks, Leah Ettman, Kitty Hsu Dana, JaKaiya Frisby, Clifford M. Johnson, and Todd Wilson.

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### Opioid Use Disorder: City Actions and Opportunities to Address the Epidemic

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# Introduction

he opioid epidemic in the United States touches every community and every stage of life. The impact of Opioid Use Disorder (OUD)\* on premature death in the United States has been widely reported,<sup>1,2,3,4,5</sup> and the crisis has become a political priority as well as a public health imperative.<sup>6,7,8</sup> An effective response by municipal leaders will require a comprehensive, multi-sector approach. Fortunately, mayors and other city officials are already taking action, often working closely with community partners, counties and state Medicaid programs.

The **Prescription for Action** report from the National League of Cities and the National Association of Counties reminds us that local leaders can have a profound impact on the way the opioid epidemic is addressed and managed in their community.<sup>9</sup> This brief provides examples of city actions to address the opioid epidemic and highlights opportunities — through the use of Medicaid, federal grants, and other resources — to expand those efforts.

### HIGHLIGHT Burlington, Vermont

As part of the Chittenden County Opioid Alliance,<sup>10</sup> the City of Burlington piloted a "hub-andspoke" model that has since been adopted by the entire state of Vermont to organize their provider and treatment-centered response to the opioid epidemic. Following implementation, Vermont now has the highest capacity for treating Opioid Use Disorder (OUD) in the U.S. The model divides Vermont into five regions, organized around an opioid treatment provider with a license to dispense buprenorphine and sufficient staff to assess and treat opioid patients' medical and psychiatric needs. From this "hub" jut "spokes" of nurse-counselor teams focused on family services, corrections, residential services, in-patient services, pain management clinics, medical homes, substance abuse outpatient treatment and/or mental health services.<sup>11</sup>

As a result of this model, Vermont increased the number of opioid patients served more than threefold during its first three years and reduced the length of its treatment waiting lists even as demand increased.<sup>12</sup> A key component of the hub-and-spoke model's success is the incorporation of the Burlington Police Department, which is transitioning from punishing addiction as a crime to treating it as a disease. The Chittenden County Opioid Alliance tracks its progress using a scorecard, which it provides to the public as an online tool that shares information about the state's progress.<sup>13</sup>

<sup>\*</sup> Opioid use disorder is defined as mild, moderate, or severe recurrent use of opioids that causes clinically and functionally significant impairment, such as health problems and failure to meet major responsibilities at work, school, or home. Symptoms include: strong desire for opioids, inability to control or reduce use, use of larger amounts over time, development of tolerance, and others. See: Substance Use Disorders. SAMHSA. At: https://www.samhsa.gov/disorders/substance-use

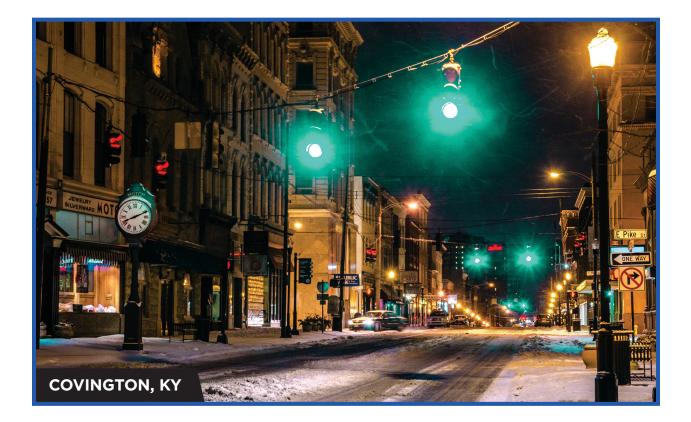
Collaborative efforts are often stronger and more far-reaching than the work that any single entity could accomplish.

# Align Across Sectors and Systems

unicipal leaders recognize that they cannot end this epidemic alone and that a diverse range of community partners will bring unique perspectives and assets to the development of local prevention, treatment, and recovery solutions. Partnerships between city, county and state agencies as well as the engagement of a broad range of other local stakeholders can lead to innovative strategies and create new opportunities to help residents at risk of or struggling with addiction. Partnerships can also ensure all city residents are receiving equitable access to treatment and support.

Collaborative efforts are often stronger and more far-reaching than the work that any single entity could accomplish. For instance, the city parks and recreation department may collaborate with a local housing agency to help people transition into more stable and supportive housing. Law enforcement and emergency medical services can cooperate to help overdose victims receive and maintain the mental health and recovery assistance they need. City leaders can enlist the help of local colleges or universities to collect, analyze and apply data to track progress and improve the city's response to this crisis. By investing in relationships and building coalitions among these and other stakeholders, mayors and other city officials can create ecosystems that support effective prevention, treatment and recovery efforts.

Known as "heroin ground zero," local leaders in Northern Kentucky have developed a collective response to address the unprecedented impact of the heroin epidemic on local communities. Partners include the Heroin Impact Response Leadership Team, the Northern Kentucky Drug Strike Force, local law enforcement, county prosecutors and the justice system. Northern Kentucky's detailed plan to reduce the impact of heroin on its communities includes reducing the supply of heroin and other drugs within communities through local law enforcement efforts and residents' surveillance; establishing a regional infrastructure for governance and accountability to research and communicate findings about the sociological, medical and economic impact of the epidemic on Northern Kentucky communities to professionals, advocates and the public; advocating for systems change;



and reducing the demand for drugs through improved prevention efforts that seek to lower youth prescription drug use and promote mental, social and environmental health, especially in schools.<sup>14</sup>

**Tempe, Arizona** is part of a regional collaborative made up of city and county leaders, that educates young adults in the region about topics related to the opioid crisis. Under the jurisdiction of the Regional

Opioid Action Planning Committee, the city has mobilized action by the multisectoral Tempe Coalition, the Tempe Fire Medical Rescue, and the Tempe Union High School District to provide education and outreach to Tempe's young people about opioid addiction and recovery resources. In collaboration with state and regional health departments, the city is also collecting data for use in these educational efforts, regional planning, and other strategies.<sup>15</sup>

### Promote Evidence-Based and Evidence-Informed Prevention Programs

ddiction early in life can lead to a myriad of health problems and can create barriers to success later in life. For this reason, it is important that city leaders step forward as champions for prevention programs that have evidence of success. Because most young people are enrolled in schools, school nurses and social workers are in an optimal position to help them prevent opioid misuse. Strong city partnerships with school officials are essential to maximize these efforts.

Public schools in numerous states have adopted Screening, Brief Intervention, and Referral to Treatment (SBIRT) and other substance use and risk factor screening tools to help fight addiction early-on. In 2016, the state of Massachusetts began requiring public schools to implement SBIRT.<sup>16</sup> Studies have shown that even a single screening with SBIRT can motivate students to seek help,<sup>17</sup> lower rates of drug misuse, and reduce the risk that traumatic events will trigger longterm struggles with addiction,<sup>18,19,20</sup> though a vast majority of studies have not focused specifically on opioid misuse. Economic impact research suggests that investing in SBIRT results in returns on investment of up to \$5.60 per dollar spent.<sup>21</sup>

Using tools like SBIRT should not be confined to public school students, as atrisk community members of all ages should be identified early and linked to care, as needed. Experts suggest these tools are being underutilized, and use of such risk factor screening tools should be expanded.<sup>22</sup> To this end, the State of **Maryland** has been expanding its use of SBIRT in a multitude of diverse sites through its Opioid Operational Command Center, which brings together various state departments to facilitate interagency data-sharing and collaboration on methods to combat the opioid epidemic.<sup>23</sup> The Maryland Department of Health has implemented SBIRT programs for adults in approximately 22 primary care locations, in 10 cities and counties, including **Baltimore** City and County. In Baltimore, three hospitals participate in the SBIRT project, as the Baltimore City Health Department is leading a city-wide effort to expand the use of SBIRT to all healthcare institutions in the city.<sup>24</sup>

Grants to implement initiatives like SBIRT are available through the Substance Abuse and Mental Health Services Administration (SAMHSA).<sup>25</sup> Cities can monitor SAMHSA's grant announcement webpage to find grants that can help fund substance use



disorder prevention and treatment options in their jurisdictions.<sup>26</sup>

Communities that Care (CTC) is another prevention-oriented intervention that cities are utilizing to combat the opioid epidemic. CTC is designed to promote healthy youth development, reduce problem behavior and increase positive youth outcomes (such as higher percentages of students graduating from high school on time, fewer teen pregnancies and better mental health in their 20s)<sup>27</sup> by creating tailored, evidencebased interventions for families, children, and adolescents.<sup>28</sup> Results from the Community Youth Development Study (CYDS) suggest intensive CTC interventions slow the growth of "lifetime problem behaviors" (e.g., substance use, delinquency, teen pregnancy, dropping out of school and violence)<sup>29</sup> in cohorts of children in communities that received these interventions.<sup>30</sup> In 2017, **Fountain, Colorado** became the first city in the state to build on the successes of CYDS by developing its own CTC program aimed at creating "a stronger sense of family, community and society as a means to prevent kids and teens from using drugs or alcohol."<sup>31</sup>

### Advocate for Expanded Prevention, Treatment and Recovery Services

ffective programming to combat the opioid epidemic must be comprehensive and include services that prevent, treat, and help individuals recover from opioid use disorder. Prevention, treatment, and recovery services work together to ensure individuals have access to the services they need based on their current opioid use.

Cities can work to ensure that local providers are receiving appropriate training in both opioid prescribing and comprehensive, effective pain management, as one component of preventing opioid addiction. A number of states require additional training for certain opioid prescribers,<sup>32</sup> and the U.S. Centers for Disease Control and Prevention's (CDC) Guidelines for Prescribing Opioids for Chronic Pain are included in the curricula of more than 60 medical schools.<sup>33,34</sup> According to the American Medical Association (AMA), more than 118,000 physicians completed training in opioid prescribing and opioid addiction-related issues in 2015 and 2016. Additionally, the American Medical Boards added an addiction medicine subspecialty in March 2016.35

Mayors and other municipal officials can also highlight the need for expanded treatment options in their communities while working with leaders in the health sector to advocate for changes in the way opioid use and misuse is addressed. Treatment is available in a number of different settings including self-help groups, outpatient rehabilitation, inpatient rehabilitation, hospitals, and private doctor's offices.<sup>36</sup> Nevertheless, only 12 percent of those with a substance use disorder actually receive treatment. In many areas, drug treatment specialists and facilities are in short supply. Additional education and training of healthcare providers about opioids and addiction are urgently needed.

Advocacy is particularly needed with regard to the expanded use of medication assisted therapy (MAT) (i.e. buprenorphine, naltrexone, or methadone).<sup>37</sup> Nearly all state Medicaid programs report covering at least one form of the anti-addiction medicines used in MAT, but local provision of MAT may be limited. SAMHSA provides grant opportunities to "expand/enhance access to MAT services for persons with an opioid use disorder seeking or receiving MAT." <sup>38</sup> These grants are earmarked for states with high rates of opioid use disorder treatment admissions, particularly states in which there has been a significant increase in admissions.<sup>39</sup> City leaders with high rates of opioid use in their jurisdictions may consider working with state officials to emphasize the importance of expanding MAT access and facilitating the development of grant proposals to apply for funding.

Medicaid 1115 waivers are another, largely untapped, route for expanding access to MAT. The Centers for Medicaid and Medicare Services (CMS) provides states with additional flexibility to help improve access to substance use disorder treatment

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In many areas, drug treatment specialists and facilities are in short supply. Additional education and training of healthcare providers about opioids and addiction are urgently needed.

through Medicaid 1115 waivers.<sup>40</sup> These waivers allow states to provide more comprehensive care for individuals with a substance use disorder by waiving certain provisions of Medicaid law to test alternative models of care delivery. **New Jersey**'s recently approved 1115 waiver offers increased access to MAT, along with peer support and targeted case management in residential treatment facilities<sup>41</sup> through its Opioid Use Disorder/Substance Use Disorder program.<sup>42</sup>

Finally, city leaders can advocate for expanding access to recovery services. Recovery — the "process of change through which individuals improve their health and wellness, live self-directed lives, and strive to reach their full potential" — is supported by good health, stable housing, meaningful daily activities, and a sense of community.<sup>43</sup> Increasing access to mental health and social support services can help those in recovery from opioid use disorder stay in recovery.<sup>44</sup> Cities can also work to increase access to affordable housing which can further help those in recovery stay in recovery.

#### A multi-sector effort in **Everett**,

Washington, between city officials, the local police department, housing services, social workers, and mental health professionals aims to combine housing and mental health supports to assist in recovery. The opioid epidemic, lack of affordable housing, and lack of jobs have led to a 65 percent increase in individuals living outdoors over the past two years.<sup>45</sup> In response, social workers have been riding along with police officers to find and connect homeless individuals, many of whom suffer from opioid use disorder, to recovery and housing services. Additionally, Everett is building a supportive housing project for the chronically homeless where they will have 24-hour access to mental health and recovery supports.



# Work with State Officials to Access Medicaid Funding

edicaid beneficiaries are twice as likely as those with private insurance to be prescribed opioids and are six times more likely to die from an opioid overdose.<sup>46</sup> Medicaid plays an important role in providing critical care to these individuals, covering 3 in 10 people with opioid addiction in 2015.<sup>47</sup>

In addition to the SUD-related services covered in the traditional Medicaid program, the Affordable Care Act (ACA) requires state Medicaid programs to cover substance use disorder treatment services for their Medicaid expansion populations.<sup>48</sup> For those states that have expanded Medicaid, services like detoxification, rehabilitation, recovery, medication assisted treatment, and mental and behavioral health services are available,<sup>49</sup> although there is variability among state Medicaid programs in what specific services are covered under each of these categories.<sup>50</sup>

Mayors can work with their State Medicaid offices to ensure that the full range of treatment and recovery services is accessible in their city. For example, states could use a Section 1115 waiver to cover the costs of residential opioid use disorder treatment for Medicaid beneficiaries. Currently, Medicaid does not cover residential treatment in certain institutions for beneficiaries between the ages of 21 and 64.<sup>51</sup> Known as the "**Institution for Mental Diseases (IMD) exclusion**," an IMD is "a hospital, nursing facility, or other institution of more than 16 beds that is primarily engaged in providing diagnosis, treatment or care of persons with mental diseases, including medical attention, nursing care and related services."<sup>52</sup>

In addition to expanding the use of an IMD through a waiver, the ACA's Medicaid Emergency Psychiatric Demonstration is testing whether eliminating this exclusion is beneficial from a cost and care perspective.<sup>53</sup> Eleven states and the District of Columbia submitted proposals which CMS approved outlining how they would use IMDs to treat state residents, track patients, monitor stabilization, and develop recovery plans, post-IMD stay.<sup>54</sup> These states may use Medicaid funding, including up to \$75 million in federal matching funds, to pay for admissions to these facilities.<sup>55</sup>

# 65%

increase in individuals living outdoors over the past two years due to the opioid epidemic, lack of affordable housing, and a lack of jobs Cities have an important role to play in encouraging policies that would address the IMD exclusion. For example, cities could encourage or incentivize Medicaid Managed Care Organizations (MCOs) to cover treatment in IMDs, a flexibility available in some states.<sup>56</sup> Cities could work closely with state Medicaid staff to develop waivers to address the IMD exclusion. Medicaid 1115 waivers, like New Jersey's (described above), may be used to address the current IMD exclusion and provide additional access to substance use disorder treatment.

Mayors should be alert to efforts underway in their state to draft and submit a waiver under this section of the Medicaid statute. The ACA has made the waiver process significantly more transparent, requiring a 30-day comment period at the state level before a waiver is submitted to CMS.<sup>57</sup> City agencies can also turn to existing relationships with state Medicaid agencies to remain aware of any developments in this area. Where waiver efforts are not yet underway, mayors could advocate for their governor and state Medicaid agency to pursue waivers that would allow for more innovative efforts around SUD prevention and treatment.

**Virginia** submitted and was approved for a waiver demonstration project that

implements the Addiction and Recovery Treatment Services (ARTS) Delivery System to provide treatment for those with substance use disorder.<sup>58</sup> Specifically, the demonstration project expands Virginia Medicaid's substance use disorder benefits package to include the full continuum of care, integrates these services into comprehensive managed care, and introduces new requirements to improve the quality of addiction care. Though the waiver is not specifically focused on opioid addiction, outcomes and rates of opioid use disorder improved significantly in the first three months of the demonstration.<sup>59</sup>

Medicaid health homes also provide opportunities for cities to address opioid use. Medicaid health homes offer care management and coordination for Medicaid beneficiaries with a number of different chronic conditions, including substance use disorders.<sup>60</sup> Several states including Maryland and Rhode Island have specifically targeted Medicaid beneficiaries who suffer from opioid use disorder for treatment in Medicaid health homes.<sup>61</sup> While provider structure, type of enrollment and approach to payment differ based on the needs of beneficiaries and local providers. the health homes generally provide Opioid Treatment Programs and case management for eligible state residents.<sup>62</sup>

## Collaborate with Industry and Nonprofit Partners

s part of their efforts to advance more comprehensive approaches to the opioid epidemic, city leaders can reach out to industry and nonprofit partners to develop and implement creative strategies that reduce opioid-related deaths and the trauma resulting from opioid addiction.

Health departments in **New York City** and **New York State** are collaborating with Adapt Pharma\*, the producers of NARCAN nasal spray, a drug which can reverse opioid overdoses, to expedite the distribution of NARCAN to first responders. Previously, the city and state needed to work with a number of different distributors, each with different prices and delivery times, to get the medication. The one-year agreement between the city, state, and Adapt Pharma creates a centralized system through which health departments can order the drug and receive it in as little as one day.<sup>63</sup> Getting NARCAN and other formulations of naloxone into the hands of first responders is a key step in driving down the rate of opioid overdose deaths. Between January and September 2017, New York City police officers saved at least 140 lives using NARCAN.<sup>64</sup>

In Lowell, Massachusetts, the local district attorney's office, the Lowell police department and the Mental Health Association of Greater Lowell (MHA) have entered into a publicprivate partnership called Project CARE (Child Assessment and Response Evaluation). This program provides rapid response intervention for children with family members who have suffered an opioid overdose. It enables first responders entering homes where an opioid overdose has occurred to alert MHA when a child is present, so the organization can coordinate services for the child.<sup>65</sup> While the program is too new for a robust evaluation of effectiveness, those involved hope it will enable children exposed to such trauma to overcome it and go on to lead healthy lives.66

### HIGHLIGHT The Role of Data in Boston, Massachusetts

**In 2015, the office of Boston Mayor Martin Walsh** and the Blue Cross Blue Shield of Massachusetts Foundation formed a partnership to conduct an analysis of the substance use and addiction problem in the city. Researchers analyzed data from federal, state and local data sources, interviewed state and local officials and conducted community-based focus groups to determine clear recommendations for the City of Boston.

The main goals of the analysis were to 1) identify the demand for and capacity of addiction and recovery services in Boston; and 2) develop recommendations to enhance and improve the current system of care, with specific suggestions on the creation and future activities of the Mayor's Office of Recovery Services. Based on their findings, the workgroup recommended that the City of Boston prioritize recovery, strengthen citywide partner-ships and programs to provide services to individuals and families impacted by addiction and lend its voice to reduce stigma and encourage individuals to seek treatment. Using these findings as a roadmap for action, Mayor Walsh created the Mayor's Office of Recovery Services. This represents the first municipal recovery office in the United States that uses a highly localized, collaborative approach to address substance abuse and addiction in the area. It works with a variety of federal entities, other local government departments in Boston, local service providers, and other stakeholders to develop citywide recovery strategies.

\*Adapt Pharma is a partner with the NLC in the U.S. Communities Government Purchasing Alliance.

## Reassess Approaches to Policing and Criminal Justice

n the midst of the growing opioid epidemic, city leaders, public health professionals, and local law enforcement officials are increasingly seeking new ways to work together and are exploring alternatives to arrest and/or incarceration for lower-level criminal behaviors rooted in addiction.

Indianapolis, Indiana: In 2017, Indianapolis launched its Mobile Crisis Assistance Team pilot project in the Indianapolis Metropolitan Police Department's East District, which receives a high rate of emergency medical calls related to both medical and mental health issues. The team consists of an emergency medical provider, a police officer, and a licensed mental health professional who respond to crisis calls as a unit in an effort to reduce the number of people who are arrested or brought to an emergency department unnecessarily. This initiative is part of the city's efforts to reform the criminal justice system using national best practices.

**Seattle and King County, Washington** unite law enforcement, public health officials, city and county leadership, community stakeholders and private-sector support in LEAD: the Law Enforcement Assisted Diversion program. Through LEAD, lowlevel drug offenders are diverted from the criminal justice system, and instead connected to trained clinicians who specialize in medication-assisted treatments and services such as mental health support, housing, and job training.<sup>67</sup> An independent evaluation by University of Washington researchers found that this program significantly reduced both recidivism and criminal justice spending.<sup>68</sup>

Buffalo, New York: In May 2017, Buffalo launched an opioid intervention court. This program is an alternative version of a traditional drug court and reduces the amount of time it takes for individuals to get into a treatment facility or detox program. Instead of immediately facing criminal charges or being sent to jail after a drug-related arrest, this intervention allows non-violent individuals with substance use disorder the opportunity to get treatment and lower their sentencing or have it dismissed. Participants are required to appear in court within a day of their arrest and then are sent to residential rehab clinics. Following a month of inpatient treatment, participants must go to court to speak with the judge each day for 30 consecutive days; are drug tested on a regular basis; and must adhere to a number of other requirements, including participation in outpatient care. The work is being financed by a three-year \$300,000 grant from the U.S. Department of Justice, with the goal of treating 200 people in the first year and creating a model that other cities can replicate.

# Considerations for Moving Forward

n moving to address the opioid epidemic, mayors and other city leaders can play many key roles.

**Influence Change:** Local elected officials are in a unique position to influence cultural change within their communities by mobilizing key stakeholders, reducing stigma and changing local policies.

#### Foster Regional & State Alignment:

Through state and regional cooperation, municipal officials can recruit new allies with a diverse array of perspectives and assets, in the process enabling greater participation and buy-in from the community at large. Advocate: Particularly as cities achieve successes and collect valuable data about what works, city leaders will find increased opportunities to educate state and federal partners and advocate for greater funding, expanded services and more systematic approaches to combatting the epidemic at all levels.

**Build Resilience:** Finally, by developing local leaders with a deep familiarity of the crisis and special understanding of how to combat it, cities can become more resilient not only in the face of the opioid epidemic, but against whichever social, environmental, and systemic public health issues may arise.

### **HIGHLIGHT** New Federal Funding Opportunities

**The 21st Century Cures Act allocated \$1 billion in funding** over two years to combat the opioid crisis; \$500 million was appropriated in 2017. The Comprehensive Addiction and Recovery Act (CARA) authorized \$181 million per year; CARA 2.0, introduced in February 2018, would authorize an additional \$1 billion for evidence-based prevention, enforcement, treatment, and recovery programs, pending passage and appropriations from Congress. In addition, the most recent budget agreement approved by Congress in February 2018 includes \$6 billion in additional funding for the opioid crisis. 69 Cities should closely monitor funding opportunities and identify any programs or awards that would bolster efforts at the local level.

# **Opioids Through the Lifecycle**



pioids impact every part of the lifecycle, and use of opioids in one stage often greatly influences an individual's life in other life stages. The opioid crisis is often discussed in terms of overdoses and premature death, but its consequences are diverse and far-reaching. Opioid misuse has taken an insidious toll on families, the foster care, legal, and educational systems, elderly care, and the workforce. Therefore, the crisis should be addressed at every stage of the lifecycle, as well as within the institutions that are affected. The following section elucidates the impact of opioids from birth through old age, highlighting key impacts beyond the individual that may provide critical areas of intervention.

#### Birth

Rates of Neonatal Abstinence Syndrome (NAS), which refers to withdrawal symptoms experienced by newborns exposed to opioids in utero,<sup>70</sup> have risen in parallel with the opioid epidemic. As the epidemic escalated between 1999 and 2013, rates of NAS increased 300 percent.<sup>71</sup> While an uncomplicated birth costs

\$3,500 per infant on average, the average hospital charge for infants with NAS can be as high as \$93,400.72 At times, hospitals may be required to absorb these costs because the family is unable to pay, adding additional challenges for local hospitals. Further complicating matters, infants whose parents suffer from opioid use disorder are often removed from their mother's custody - despite evidence that such separation can lead to slower recovery for the infant - and placed into the increasingly burdened foster care system.<sup>73,74,75</sup> Experts and professional societies in both pediatrics and obstetrics note the importance of addressing NAS through resources, treatment, and nonpunitive support for pregnant women.<sup>76,77</sup>

#### Children

Between 2012 and 2015, the number of children in the United States in the foster care system increased eight percent.<sup>78,79,80</sup> Parental substance use disorder is the second leading cause of children entering the foster care system, accounting for approximately one-third of all removals since the Administration for Children and Families began reporting these data in 2015.<sup>81</sup> Further, removals for parental substance use have grown at a pace more rapidly than other removal causes like housing instability.<sup>82</sup> Eventually, children themselves may start to abuse opioids, often at increased risk of bodily harm or death.

### Adolescents

The rate of overdose drug deaths among those ages 15 to 19 increased by more than 150 percent between 1999 and 2007, from 1.6 deaths per 100,000 to 4.2 per 100,000.83 This follows the trajectory of opioid prescribing rates for young adults during this time, which nearly doubled between 1994 and 2007.84 Although overdose deaths in this age group temporarily declined between 2007 and 2014. the most recent data from 2015 suggests drug overdose deaths are back on the rise, increasing to 3.7 per 100,000.85 Opioids were the driving force behind both periods of increasing drug overdose death rates in this age group.<sup>86</sup> Alarmingly, adolescents have reported declines in usage of both heroin and prescription opioids, particularly since 2009.87 Yet they still suffer from increasing opioid overdose death rates suggesting the use of opioids has become more dangerous thanks to powerful new opioids like fentanyl.88

### **Non-Elderly Adults**

Adolescents who reach adulthood may join the nearly 5 percent (11.5 million) of U.S. adults\* who have misused prescription opioids,<sup>89</sup> including approximately 1 percent (1.9 million) with an opioid use disorder.<sup>90</sup> Opioids are heavily used by this cohort, most often with a prescription. However, with an estimated 91.8 million adults who have used prescription opioids within a year, the opportunity for nonmedical use is high; this cohort also reports dramatically increasing usage of nonprescription opioids, like heroin.<sup>91</sup> Between 2002 and 2013, there was a 138 percent increase in usage of heroin among those who reported nonmedical use of prescription opioids.<sup>92,93</sup>

Though direct correlations may be hard to draw, there is a notable association between opioid overdose and deaths and the employment rate. In a recent paper for the National Bureau of Economic Research, the authors found that every one percent increase in the national unemployment rate was correlated with a seven percent increase in opioid overdoses and a 3.6% increase in opioid-related deaths among U.S. adults.<sup>94</sup>

#### Seniors

While older adults over age 50 are the least likely to misuse opioids, use among this population increased nearly twofold between 2002 and 2014, from 1.1 percent to 2 percent.<sup>95</sup> Similarly, while adults ages 25 to 64 make up a majority of opioid overdose deaths, it is the older portion of this population—those ages 55 to 64—who have seen the largest increases in overdose deaths.<sup>96</sup>

### ACTION Interventions throughout the Lifespan

When developing policies and implementing programs to address opioid addiction, cities should consider putting in place programs and initiatives that respond to the opioid crisis across the lifespan. Some models, such as SBIRT, have wide-ranging applications from schools to emergency departments; some policy changes stand to benefit virtually the entire population. Other interventions, such as school-based education programs, are tailored to address the needs of individuals in specific stages of their life. Cities, in collaboration with state and other local officials, should assess their specific needs and ensure that their comprehensive plans sufficiently address the needs of all stages of life—from pregnancy through childhood to mature adulthood.

### **Tools for Advocates**

NACo-NLC Opioid Report Portal www.opioidaction.org

National League of Cities www.nlc.org

National Association of Counties www.naco.org

National Governors Association www.nga.org

White House Office of National Drug Control Policy https://www.whitehouse.gov/ondcp

Substance Abuse and Mental Health Services Administration http://www.samhsa.gov/

American College of Obstetricians and Gynecologists www.acog.org

American Medical Association https://www.ama-assn.org/

National Association of County and City Health Officials http://www.naccho.org/

National District Attorneys Association http://www.ndaa.org/ International Association of Chiefs of Police http://www.theiacp.org/

National Association of County Behavioral Health and Developmental Disability Directors http://www.nacbhd.org/

National Association of State Alcohol and Drug Abuse Directors http://nasadad.org/

Community Anti-Drug Coalitions of America www.cadca.org

The Red Ribbon Campaign www.redribbon.org

Additional City Model — Brockton, MA

https://www.youtube.com/ watch?v=H3kctDJ3BaU

Association of State and Territorial Health Officials http://www.astho.org/

#### Walgreens Take Back Locations

https://walgreens.maps.arcgis.com/apps/ MapSeries/index.html?appid=53cf1b54a bf34c4bacdec863e5c56391

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