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America's War on Drugs: Applying a Supply and Demand Framework for the Opioid Epidemic Through the Lens of Federalism

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TRINITY COLLEGE

Senior Thesis

America's War on Drugs: Applying a Supply and Demand Framework for the Opioid Epidemic
Through the Lens of Federalism

submitted by

Cari Librett

In Partial Fulfillment of Requirements for
the Degree of Bachelor of Arts

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Reader: Professor Rachel Moskowitz

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Mom, Dad, and Krista: this is, of course, for you.

Introduction:

Detective Gregg: Fighting the war on drugs... one brutality case at a time

Detective Carver: Girl, you can't even think of calling this s*** a war

Detective Hauk: Why not?

Detective Carver: War's *end*

-- *The Wire*: Season 1, Episode 1

Like millions of American children, Michael Botticelli grew up in a family with a long history of addiction. By early adulthood, Michael too had become an addict. After being arrested for driving under the influence, a lenient judge gave him the option of entering treatment or going to prison.¹ Like many addicts would if given the chance, Michael opted for treatment and has maintained sobriety ever since. After completing the rehabilitation program, he built a career for himself in the Massachusetts Department of Health and worked tirelessly to improve treatment options for those afflicted with substance use disorders. His efforts recently became recognized on a national scale, and in 2014 he was selected to be the Director of the White House's Office of National Drug Control Policy under President Obama. He is the first person in substance abuse recovery to hold the position.

Michael's success story is all too rare. Currently, only 12% of Americans suffering from addiction are receiving treatment of any kind.² Generally, this is because it is widely unavailable, not because the addicts do not *want* treatment. This phenomenon is particularly troubling in the face of the current American opioid epidemic, which is becoming increasingly problematic every day. Compared to the rest of the world, the United States is experiencing rapidly climbing rates

¹ Alan Schwartz, "Michael Botticelli is a Drug Czar Who Knows Addiction Firsthand," *The New York Times*, April 25, 2015, https://www.nytimes.com/2015/04/26/us/michael-botticelli-is-a-drug-czar-who-knows-addiction-firsthand.html?_r=1.

² Lloyd Sederer, "A Blind Eye to Addiction: Drug and Alcohol Addicts in the U.S. Aren't Getting the Comprehensive Treatment They Deserve," *U.S. News*, June 1, 2015, <https://www.usnews.com/opinion/blogs/policy-dose/2015/06/01/america-is-neglecting-its-addiction-problem>.

of drug overdoses and overdose fatalities, evidenced by the fact that although the United States only accounts for 5% of the world's population, it is now responsible for over 25% of the world's overdoses.³ In 2016 alone, there were over 64,000 recorded drug overdose deaths in the United States, the highest rate ever recorded, of which half were attributable to opioid-related substances.⁴ In a stunning, unprecedented moment in American history, drug overdoses are now the leading cause of American injury death, above both car crashes and gun incidents.

Unlike other previous drug epidemics, what makes the opioid epidemic especially unique is not only the unparalleled nature of the issue, but also the policy approaches being put forward that are attempting to combat it. For the past fifty years, American drug policy has been manipulated and enforced in a way that has made it possible for drug epidemics to occur and has exaggerated their negative consequences on society. Put simply, prior to the 1970s, widespread drug enforcement was basically non-existent. However, the War on Drugs policy initiatives first implemented in 1970 created a national drug law enforcement structure that mainly consisted of criminal justice-based policies, such as extremely punitive drug laws, as a method to reduce the supply of illegal drugs. There is now a broad consensus among scholars, policymakers, and the general public that not only has the War on Drugs failed to diminish the supply of illicit drugs to any significant degree, but also that it has criminalized addiction. As the severity and intensity of the opioid epidemic continues to grow, many are replacing drug war era policies with alternative strategies.

³ Sederer, "A Blind Eye to Addiction: Drug and Alcohol Addicts in the U.S. Aren't Getting the Comprehensive Treatment They Deserve."

⁴ German Lopez, "How Obama Quietly Reshaped America's War on Drugs," *Vox*, January 19, 2017, <https://www.vox.com/identities/2016/12/19/13903532/obama-war-on-drugs-legacy>.

This thesis seeks to evaluate *why* the War on Drugs policies failed and trace the astonishing trajectory of the opioid epidemic in order to recommend realistic, effective, and innovative policy solutions that can be successful in curbing the crisis. As a way to comprehend and categorize the vast array of possible solutions, I use the basic economic theory of supply and demand. In terms of addressing a drug epidemic, supply-side policies include any policies that look to diminish the *supply* of drugs through criminal justice-based, law enforcement strategies like incarceration, interdiction, and production control. Demand-side policies constitute any strategies that attempt to diminish the *demand* for illicit drugs, the demand referring to the addicted users themselves. As Chapter One will discuss, the War on Drugs is now perceived as a failure because strictly supply-side policies were implemented, which did not take the demand of the addicted users into account. Chapters Two and Three will provide a brief history about how the War on Drugs policies have proliferated into the opioid epidemic, and how the first prescription opioid wave of the epidemic directly led to the more recent heroin and fentanyl wave of the crisis. Chapter Four provides specific examples of successful policy solutions that have been implemented on the state and local levels of government. Lastly, and most importantly, Chapter Five aims to fill one of the gaps I perceive to be in the available literature on drug policy and epidemics.

While the supply and demand framework is useful, a broad recognition that the War on Drugs era increased state and local involvement in drug enforcement in terms of both supply-side and demand-side initiatives, despite drug policy being a federally mandated policy, is missing from the literature. This “federalization of drug policy” suggests that when one is contemplating policy solutions, both the two different types of policy approaches and the *level* of government that is best suited for particular policies, must be taken into consideration. Thus, this thesis

attempts to apply a two-layered framework of supply and demand within the scope of federalism in order to answer that complicated question.

The efforts to eliminate the supply of drugs, drug consumption, and addiction from the United States have failed. As I will argue, there are a set of reasonable, justifiable, and possible policy solutions that *have* worked, and *can* work in every region of the country that has been disproportionately affected by this crisis. Hopefully, by providing a new framework, this thesis can offer some innovative insights about how the United States can approach this ongoing issue.

Chapter I: Applying a “Supply and Demand” Model for the War on Drugs Policies 1970-2000

“You want to know what [the war on drugs] was really all about, The Nixon campaign in 1968, and the Nixon White House after that, had two enemies: the antiwar left and black people. We knew we couldn’t make it illegal to be either against the war or black, but by getting the public to associate the hippies with marijuana and blacks with heroin, and then criminalizing both heavily, we could disrupt those communities. Did we know we were lying about the drugs? Of course we did.” – John Ehrlichman, White House Domestic Affairs Advisor 1969-1973

I. Introduction

The United States has been fighting the so-called “War on Drugs” for the past fifty years, beginning with the declaration of drugs as “America’s public enemy number one” by the Nixon administration in 1971.⁵ Despite a decades-long battle against drug misuse and abuse, there are now more drugs, with higher potencies, at cheaper prices, available now than before these initial policies were implemented. This paradoxical phenomenon has led scholars, experts, and policy makers to attempt to understand the causes and create possible solutions of drug epidemics through the use of theories and perspectives drawn from various disciplines. Although there are many prisms one can use to evaluate drug policy, one of the most popular methods used to study the effectiveness of complex and wide-ranging drug policies is the basic economic paradigm of supply and demand. Through this model, scholars have been able to historically analyze various failed American drug policies, creating the workable and inclusive theoretical framework needed to craft, categorize, and understand the sweeping drug policy solutions made since the beginning of the drug war. It is crucial, then, to explore this economically based perspective through a historical narrative of the War on Drugs policies in order to comprehend how the federal government implemented a draconian, supply-side drug policy that subsequently incentivized and shaped attitudes towards illegal drugs on the state level. The similarities and coordination

⁵ Dora M. Dumont, et al., “Public Health and the Epidemic of Incarceration,” *Annual Review of Public Health* 33, (April 21 2012): 327, <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3329888/>.

between the national and state drug policies, first molded by the policies set on the federal level and the adopted on the state levels, has to be understood before considering possible solutions for the current opioid epidemic that has been perpetuated by both of these levels of drug policy.

II. Supply and Demand Theoretical Model for Drug Policy

In this model, the “supply-side” refers to the enforcement, distribution, source-country interdiction, and production controls of drugs, while the “demand-side” refers to the treatment, education, and prevention programs put in place to reduce the number of drug users.⁶ In other words, “supply-side” policies represent the criminal justice-based, law enforcement-focused approaches used to minimize the amount of drugs available, while “demand-side” policies represent a public health approach grounded in treatment that aims to diminish the demand of drugs by decreasing the number of people who use them. The ideological differences between supply-side and demand-side strategies have formed the main crux of the debate regarding which policies will successfully reduce illegal drug use in the United States if implemented.

Normal economic theory would predict that effective enforcement of illegal drugs (a solely supply-side policy) *should* directly reduce demand because diminishing the supply would simultaneously raise the price and minimize the availability of illicit drugs. Consequently, consumption would decrease due to drugs becoming more expensive and harder to procure.⁷ However, in this case consumption cannot be directly linked to demand because unlike other products that can be explained using a supply and demand model, illegal drugs are

⁶ Peter Reuter, “Setting Priorities: Budget and Program Choices for Drug Control,” *University of Chicago Legal Forum* 1994, no. 1 (N.d.): 145, <http://chicagounbound.uchicago.edu/cgi/viewcontent.cgi?article=1158&context=uclf>.

⁷ United States White House, Executive Office of the President, Office of National Drug Control Policy, *National Drug Control Strategy for 1989*, National Criminal Justice Reference Service, 1989, <https://www.ncjrs.gov/pdffiles1/ondcp/119466.pdf>.

psychologically and physically addictive. Therefore, even if a supply-side strategy *was* successful in making illegal drugs more expensive and increasingly difficult to acquire by reducing the supply in the market, there will still be a finite number of addict consumers who will be willing to go to further lengths to get their fix.

Subsequently, a decrease in consumption resulting from higher prices rather than lower demand merely shifts the point on the demand curve at which supply equals consumption. Therefore, a reduction in the supply is actually more likely to increase the profits for drug dealers, making the demand for drugs “inelastic.”⁸ In other words, the addictive nature of drugs means that the demand will *not* shift significantly even when the supply becomes smaller and more expensive. Therefore, drug dealers can then sell the supply they do have at higher prices, giving them the opportunity to turn a bigger profit. This phenomenon likely worsens the issue of drug use and addiction rather than mitigate it because higher revenues fiscally incentive more people to become involved in the drug trade.⁹ On the other hand, it can be assumed that an *actual* reduction in demand, potentially achieved through demand-side base policies that focus on rehabilitation, treatment, and prevention for drug addicts, could decrease consumption without generating negative side effects. However, because mainly supply-side strategies, such as increased law enforcement, mass incarceration, and interdiction, have been implemented over the past few decades, the demand for drugs has remained constant despite the enormous financial commitment to fighting the War on Drugs.

Federal drug prohibition policies began in 1914 with the Harrison Act; however, it was not until the 1990s that researchers began to separate them into either supply-side or demand-

⁸ Reuter, “Setting Priorities,” 155.

⁹ Ibid.

side responses in order to analyze their overall effectiveness in counteracting drug epidemics.¹⁰ One of the most prominent scholars associated with the supply and demand drug policy model is Peter Reuter, whose seminal writings in the early 1990s and 2000s have served as the foundational cornerstone of research pertaining to the economic-based perspective of drug epidemics and their subsequent policy responses. As an economist, he combines the economic theory of supply and demand with research on alternative approaches to drug control and federal and state responses to epidemics. At the time of his research, the dominant political strategy of the federal government was focused on supply-side solutions, and Reuter was one of the first scholars to question their efficacy, contending that the policies were “punitive (in both rhetoric and reality), divisive (certainly by race, and probably by age), intrusive (in small ways for many and in large ways for some), expensive (30 to 35 billion annually),” and most importantly, unsuccessful.¹¹ Reuter’s critique of supply-side based policies has been adopted by the majority of drug policy scholars, as it recognizes that due to the addictive nature of drugs, the illegal drug market does not fit within the normal supply and demand framework.

Later, other scholars who then used this approach expanded on this initial research to strongly criticize the federal government’s drug control budget, which year by year became more heavily weighted towards supply-side programs. For example, federal expenditures on drug control grew five-fold between 1980-1992, with 65% of the budget allocated towards enforcement programs, while only 25-35% was allocated towards preventing drug use and treating drug abuse or dependency.¹² Nevertheless, between 1980-1985, Colombian traffickers,

¹⁰ Sam Quionones, *Dreamland: The True Tale of America’s Opioid Epidemic* (New York: Bloomsbury Press, 2015), preface.

¹¹ Peter Reuter, “Limits of Supply-Side Drug Control,” *RAND Corporation*, 2001, <http://faculty.publicpolicy.umd.edu/sites/default/files/reuter/files/milken.pdf>.

¹² Reuter, “Setting Priorities,” 146.

the main source of heroin and cocaine in the United States at the time, doubled their profits from roughly \$1.5 to \$3 billion.¹³ These statistics suggest that while the spending on supply-side strategies drastically increased, the results were mediocre at best in curbing the flow of illicit drugs into the United States.

Subsequently, the reluctance of the federal government to allocate adequate resources to treatment and prevention-based programs has been widely cited as one of the main reasons for the failure of the drug war. However, the incentives, programs, and overall supportive attitude for supply-side policies instituted by the federal government subsequently tricked down to the state and local levels. Thus, it is also important to note the role of state and local governments that engaged in these types of supply-side based solutions. Combined, state and local governments spend almost as much on drug control annually as does the federal government, and their budget allocations are even more heavily skewed towards enforcement. A study conducted by the U.S. Census Bureau found that state and local governments spent a total of \$12.7 billion on drug control, as compared to the \$11 billion spent by the federal government in 1993.¹⁴ These numbers indicate that state and local governments are at least equally responsible for the negative consequences associated with implementing mainly enforcement-based strategies. Therefore, the role of states must be considered when contemplating policy solutions for drug-related crises.

Overall, there is now a broad consensus among scholars and policymakers that supply-side policy solutions are ineffective on their own. This shift in approach is reflected in the fact that most of the literature and policy recommendations that have been published in the 21st

¹³ Steven Hyland, "The Shifting Terrain of Latin Americana Drug Trafficking," *Origins: Current Events in Historical Perspective*, September 2011, <http://origins.osu.edu/article/shifting-terrain-latin-american-drug-trafficking/page/0/1>.

¹⁴ Reuter, "Setting Priorities," 152.

century have favored demand-side policies. There has also been a change in public support for policies based around treatment, rehabilitation, and prevention. Americans witnessed the failure of the War on Drugs firsthand, and public opinion is important to take into consideration because politicians seeking re-election will in part tailor their policy strategies to their constituents' demands.¹⁵ Moreover, so far over a trillion dollars of U.S. taxpayers money has been spent on these unsuccessful policies.¹⁶ The cost ineffectiveness of supply-side programs coupled with the fact that they have failed to completely eradicate the source of the drug market has been crucial in this transformation in support for supply-side and demand-side solutions.

Because this theory divides drug policies into either “supply-side or “demand-side”, it is common to conceptualize these two types of policies as two separate entities that do not have an effect on each other. However, supply disruptions *can* play a major role in the subsequent demand for a certain drug. For example, the reformulation of OxyContin, one of the most commonly abused prescription opioids, into an “abuse-deterrent” form, led directly to a rise in heroin and fentanyl overdoses and overdose deaths. The overprescribing of prescription opioids is widely believed to be the main driver of the current opioid epidemic, and OxyContin was reformulated in 2010 in a way that made it more difficult to crush the pills, the way most addicts tend to abuse them.¹⁷ Although this strategy helped curb prescription abuse, it caused large national shock to the supply of prescription opioids as they were then “unabusable.”

¹⁵ Gregory J. Madden, “Ammunition for Fighting a Demand-Side War on Drugs: A Review of Contingency Management in Substance Abuse Treatment,” *Journal of Applied Behavior Analysis* 41, no. 4 (Winter 2008): abstract, <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2606593/>.

¹⁶ Annabelle Buggle, “After 40-Year Fight, Illicit Drug Use at All Time High,” *Huffington Post*, December 6, 2017, https://www.huffingtonpost.com/annabelle-buggle/after-40year-fight-illici_b_3623714.html.

¹⁷ Abby Alpert, David Powell, and Rosalie Liccardo Pacula, “Supply-Side Drug Policy in the Presence of Substitutes: Evidence from the Introduction of Abuse-Deterrent Opioids,” *American Economic Journal* (January 2017): 45, file:///Users/carilibrett/Downloads/RAND_WR1181.pdf.

Consequently, many addicts turned to heroin as a substitute.¹⁸ This phenomenon not only highlights the challenge of addressing a deep-rooted addiction epidemic in the presence of numerous substitutes, but more importantly demonstrates the intertwined connection between supply-side and demand-side policies. Although this supply-side policy was successful in reducing the overall amount of prescription opioids available to users, it increased the demand for other, more dangerous types of opioids. Supply-side and demand-side policies contain drastically different approaches on how to successfully mitigate drug epidemics. However, in order to understand why certain types of policies fail, it is necessary to realize how one type of policy can affect the other. Exclusively supply-side solutions have failed, but it is equally unlikely that demand-side approaches alone will be successful in countering drug epidemics.

III. War on Drugs Policies 1970-2000

Generally speaking, American drug policy, which has been historically focused on supply-side strategies, has not made any significant strides in minimizing the amount of illegal drugs available in the United States. The overall rate of current illicit drug use among persons aged twelve or older has risen steadily from 6.2 to 9.4 percent between 2000 and 2013¹⁹, suggesting that these strategies have yet to produce any noteworthy changes in drug availability or perceived patterns of use.²⁰ Most federal *and* state funding has been appropriated to intensified law enforcement strategies, unwarranted punitive policies, and interdiction and eradication efforts, which have failed and will continue to fail. While American drug policy dates

¹⁸ Daniel Ciccarone, “Fentanyl in the U.S. Heroin Supply: A Rapidly Changing Risk Environment,” *International Journal of Drug Policy* 46 (2017): 108, <https://www.ncbi.nlm.nih.gov/pubmed/28735776>.

¹⁹ United States Department of Health and Human Services. Substance Abuse and Mental Health Services Administration, *Results from the 2013 National Survey on Drug Use and Health: Summary of National Findings*, SAMHSA: Substance Abuse and Mental Health Services Administration, 2014, <https://www.samhsa.gov/data/sites/default/files/NSDUHresultsPDFHTML2013/Web/NSDUHresults2013.pdf>.

²⁰ Leif Rosenberger, *America’s Drug War Debacle* (Brookfield, VT: Ashgate Publishing Co., 1996), 6.

back to the early 20th century, a full historical review goes beyond the scope of this thesis. Instead, I will focus mainly on policies starting in 1970 during Nixon's presidency, as his administration marks the true beginning of the drug war. Through an evaluation of the failed supply-side based "War on Drugs" policies employed from 1970-2000, it will become clear as to why this type of approach is highly unsuccessful in curbing drug use, misuse, and above all epidemics, such as the current opioid crisis.

The War on Drugs involved the participation and coordination of the federal, state, and local governments, including various agencies tasked with drug enforcement, federal and state criminal justice systems, and a certain degree of citizen support. However, it was also necessary to have both a presidential administration and congressional support dedicated to employing supply-side policies in order for them to come to fruition. Four presidents have personally waged a "war on drugs," beginning with Nixon, who declared drug abuse as "public enemy number one" in the United States at the time of his election.²¹ Although he made a "law and order" approach to crime a central part of his campaign, his call for a "war on drugs" proved to be largely rhetorical as his administration failed to propose dramatic shifts in drug policy. In fact, in June 1971, he addressed Congress and declared "as long as there is a demand [for drugs], there will be those willing to take the risks of meeting that demand," publicly proclaiming that efforts of interdiction and eradication would likely be unsuccessful in deterring drug use.²² In reality, the drug war was only waged sporadically during the Nixon administration, and some of the only efforts solely focused on disrupting the heroin trade. Despite some antidrug legislation that was passed by Congress later that year, the Nixon years marked the only time in the War on Drugs

²¹ Rosenberger, 34.

²² Rosenberger, 55.

when more funding went to treatment than law enforcement²³, and declining drug use and crime rates soon followed.

Despite this temporary focus on treatment, Nixon did take some preliminary actions towards creating a more supply-side based drug policy that were expanded on in later administrations. Notwithstanding his efforts to initiate treatment programs, Nixon authorized the creation of Drug Enforcement Agency (DEA) in 1973, which consolidated narcotics agents and resources from various departments into a single federal entity that would be responsible for the enforcement of drug laws.²⁴ Through the DEA, he launched a massive interdiction effort in 1973, Operation Intercept, which pressured Mexico to regulate its opium and marijuana growers through instituting increased surveillance at the Southwest America-Mexico border.²⁵ Although this was initially successful in curtailing the supply from Mexico, Colombia was quick to replace Mexico as the United States' main supplier. This failure of interdiction was the American government's first lesson in the "iron law of drug economics," which posits that as law enforcement becomes more intense, the potency of prohibited substances, in this case illegal drugs, increases.²⁶ The Nixon administration was the first administration to misunderstand that the supply-side technique of interdiction would be bound to fail due to the reality of addiction: as long as a demand exists, there will be a supply provided. Although he failed to make any significant changes to drug policy during his presidency, Nixon's use of a "law and order" approach and creation of the DEA would have lasting impacts on future policy implementation.

²³ Rosenberger, 54.

²⁴ Ted Galen Carpenter, *Bad Neighbor Policy* (New York: Palgrave MacMillan, 2003), 15.

²⁵ Lawrence Gooberman, *Operation Intercept: The Multiple Consequences of Public Policy* (Elmsford, New York: Pergamon Press Inc., 1974), 4.

²⁶ Rosenberger, 23.

Although Nixon's successors, Ford and Carter, continued to proliferate perfunctory antidrug rhetoric, in general they "seemed even less committed to substantive action, especially on the substantive front."²⁷ Even with a large increase in cocaine and heroin use in the late 1970s and early 1980s, the Carter administration was equally as uncommitted to fighting the drug war as the Ford administration had been. In a speech to Congress, Carter declared that the "penalties against possession of a drug should not be more damaging to an individual than the use of the drug itself."²⁸ During this time period, eleven states decriminalized marijuana, and other jurisdictions substantially reduced penalties for drug offenders. Contrary to the rhetoric spread by drug prohibitionists, there were negligible effects on the general consumption in the eleven states that pursued the decriminalization process.²⁹ This shift in public support and state action in building a more tolerant attitude towards drug use and the unwillingness of the Ford and Carter administrations to ramp up the drug war was intensely criticized by the "drug warriors," politicians who supported prohibition. One of the most prominent "drug warriors" of the time and member of Carter's White House Council on Drug Abuse Strategy, David Musto, admitted that despite rising rates of drug imports during this period, "we were supposed to establish a drug abuse policy for the federal government, and we did not do it. We requested meetings that were denied time and time again."³⁰ This tolerant attitude was short lived, however, and was soon to be completely eradicated in the coming Reagan administration.

President Reagan announced his own drug war in 1982, and despite originally conceding that fighting the supply-side of the drug war was a losing proposition, he soon adopted the "getting tough" and "law and order" approach to crime, especially drug crime, of his

²⁷ Carpenter, 16.

²⁸ Rosenberger, 23.

²⁹ Carpenter, 294.

³⁰ Carpenter, 21.

predecessors. The Reagan administration's enthusiasm for revitalizing the drug war was partly due to an upsurge in drug use that had taken place during the late 1970s, which can be attributed to the inefficient supply-side policies and lack of demand-based strategies initiated in the two prior decades. Reagan's promises to be tougher on crime and enhance the federal government's role in combatting it prompted crime to become a major theme throughout his campaign. However, this became an issue once he was elected because fighting street crime has traditionally been the responsibility of state and local law enforcement. Reagan found drug law enforcement to be the answer to this dilemma, and by 1981 the Justice Department announced its intention to "cut the half the number of specialists assigned to prosecute white collar criminals and shift attention to drug law enforcement."³¹ At the time, less than 2% of Americans viewed drugs as the most pressing issue facing the country.³² Following his announcement of his personal War on Drugs, the budgets for federal law enforcement agencies soared higher than ever before in order to carry out supply-side policies, while agencies tasked with demand-side solutions such as treatment, prevention, and education plummeted. Between 1981 and 1991, the antidrug funding and allocations for the FBI, Department of Defense, and the DEA increased from \$8 million to \$95 million, \$33 million to \$1 billion, and \$38 million to \$181 million, respectively.³³ During this same time period, the funding for the National Institute of Drug Abuse and the Department of Education's antidrug funds were cut from \$274 million to \$57 million, and \$14 million to \$3 million.³⁴ Subsequently, Reagan's administration mainly focused

³¹ Michelle Alexander, *The New Jim Crow: Mass Incarceration in the Age of Colorblindness* (New York: The New Press, 2010), 47.

³² *Ibid.*

³³ Katherine Beckett, *Making Crime Pay: Law and Order in Contemporary America*, (Oxford: Oxford University Press, 1990), 53.

³⁴ United States White House, Office of the National Drug Control Policy, *National Drug Control Strategy: A Nation Responds to Drug Use*, NCJRS: National Criminal Justice Reference Sample, 1992, <https://www.ncjrs.gov/pdffiles1/ondcp/134372.pdf>.

on “getting tough” on drugs, culminating in the notorious “zero tolerance” program in which punitive measures against users were emphasized rather than treatment.

In 1985, the trafficking, use, and abuse of crack cocaine, a potent form of smoke-able cocaine, exploded in American cities. Subsequently, public and government hysteria about drugs reached record highs as a moral panic arose surrounding the link between drugs and crime, particularly in poor, urban, minority inner-city neighborhoods. With this publicity, Reagan easily pushed the Anti-Drug Abuse Act of 1986 through Congress, which devoted \$1.7 billion to fight the drug crisis, and introduced harsh punishments such as the death penalty for major traffickers, life in prison for some repeat offenders, far more severe federal penalties for possession, and mandatory minimum sentences for the distribution of crack cocaine.³⁵ This Act was expanded upon in 1988, and added new “civil penalties” for drug offenders, such as granting public housing authorities the power to evict any tenant who allows drug-related criminal activity to occur on or near public housing premises, and eliminated many federal benefits, including student loans, for anyone convicted of a drug offense.³⁶

The unprecedented nature of these harsh, draconian penalties and this blatant violation of civil liberties extended beyond any traditional criminal punishments in American history and remains the legacy of the Reagan administration. As in other administrations, the drug warriors of the 1980s were oblivious to the fact that prohibitionist drug laws, not the mere existence of drugs, cause such problems. Furthermore, the Reagan administration also failed to realize that the criminalization of addiction and the introduction of these penalties would have increasingly problematic consequences on the American criminal justice and penal system.

³⁵ “Thirty Years of America’s Drug War: A Chronology,” *PBS*, 2014, <https://www.pbs.org/wgbh/pages/frontline/shows/drugs/cron/>.

³⁶ Alexander, 53.

Despite initially headlining innovative, demand-side based policies such as methadone clinics for addicts, President Clinton, a Democrat, escalated the drug war by continuing the Republican supply-side drug policy strategy. This shift in his drug policy strategy can be most attributed to political pressure from other Democrats who wanted to take control of the drug war away from the Republicans. He vowed that he would “never permit any Republican to be perceived as tougher on crime than he was,” and endorsed the idea of federal “three strikes and you’re out” laws, which require a person guilty of committing both a felony in addition to two other convictions to serve a mandatory life sentence in prison.³⁷ He also authorized more than \$16 billion for state prison grants and the expansion of state and local police forces to fight the drug war.³⁸ More so than any other previous president in the War on Drugs, Clinton’s “tough on crime policies” resulted in the largest increases in federal and state inmates than under any other president in history.

Although individual presidential administrations were crucial in intensifying the War on Drugs, the bipartisan support among Congress during both Republican and Democratic administrations was ultimately responsible for actually instituting mainly supply-side policies. At worst, these politicians excitedly supported supply-side policies focused on draconian penalties and increased law enforcement strategies knowing that they were largely ineffective in curbing drug use, addiction, and trafficking. At best, they were complicit in these actions. For example, Clinton’s Violent Crime Control and Law Enforcement Act of 1994, the largest crime bill in modern history, implemented provisions necessary for escalating the drug war by instituting the “three strikes” mandatory life sentence for repeat offenders, dedicated funding to

³⁷ David Masci, “\$30 Billion Anti-Crime Bill Heads to Clinton’s Desk,” *Congressional Quarterly*, August 27, 1994, <https://cqrollcall.com/>.

³⁸ *Ibid.*

hire 100,000 more police officers and \$9.7 billion for building more prisons, and expanded death penalty-eligible offenses.³⁹ This bill passed both the House and Senate quickly, with a total of 95 votes from the Senate in favor of passing it, including 53 Democrats and 42 Republicans.⁴⁰ Furthermore, the Republican 104th U.S. Congress killed many of Clinton's early attempts to spend more on demand-side policies that would have shifted more funding to prevention and rehabilitation. However, this was not due to political polarization, considering that the Democratic 103rd Congress of the early 1990s *also* fought shifting drug policy towards demand-side bases policies, as shown by the voting turnout for Clinton's crime bill of 1994.⁴¹ State legislatures were also eager to jump on the "get tough" bandwagon, including 28 states that passed three strikes laws of their own, including historically liberal states like Massachusetts.⁴²

This bipartisan support for punitive drug policy on both the federal and state levels is an unusual phenomenon, considering that throughout this time period Democrats and Republicans were polarized on basically every other issue. Throughout the late 1980s and early 1990s, the moral panic that arose around the dangers of crack cocaine, inner city, crime, and other drug use and trafficking in general spread from the government to the wider public. As elected officials, both Republicans and Democrats had to respond to the media coverage and their constituents' fears. For that reason, support for supply-side policies that focused on increased law enforcement and punitive measures began to become popular on both sides of the aisle. Subsequently, the cooperation, coordination, and support along party lines both on the federal and state levels for supply-side drug policy dominated the end of the 20th century and was crucial in guaranteeing that the War on Drugs policies would continue.

³⁹ Fact Sheet, *Violent Crime Control and Law Enforcement Act of 1994*, U.S Department of Justice, 1994.

⁴⁰ H.R. 3355 103rd Cong. (1994).

⁴¹ Rosenberger, 76.

⁴² Rosenberger, 77.

IV. Consequences of the Failed War on Drugs Policies

Evidenced by these examples, the law-and-order perspective first introduced in the Nixon campaign was nearly hegemonic by the mid-1990s, and no other serious alternatives to the War on Drugs were entertained in mainstream political discourse until the 21st century.⁴³ Although there were obviously other paths available to take concerning drug policy, supply-side policies ultimately triumphed. The failure of the drug war's supply-side policies to curb drug trafficking, use, and addiction infamously led to many lasting, negative consequences, such as the militarization of state and local police, mass incarceration, and a substantial fiscal impact on the federal budget. For reasons largely unrelated to actual crime trends and drug misuse, the American criminal justice, judicial, and penal systems have emerged as a system of social control unparalleled in world history.⁴⁴ This system is still the one we live in today, and has not yet been successful in mitigating any drug epidemics.

The War on Drugs would not have been possible without the cooperation of state and local law enforcement agencies to carry it out in their own communities. Because drug use was declining when the war on drugs began, the announcement that these federal drug policies would need state and local participation was initially met with confusion and resistance from these departments. The federalization of drug crime violated the principle that street crime was local law enforcement's domain, and many officials and officers were opposed to the federal government asserting itself into local crime fighting.⁴⁵ Furthermore, there was a broad consensus among state and local police that other serious crimes, such as murder, theft, and assault were all of greater concern to most communities than illegal drug use.

⁴³ Alexander, 57.

⁴⁴ Alexander, 4.

⁴⁵ Beckett, 49.

This resistance was recognized by the Reagan administration, which consequently implemented two federal programs that aimed at gaining state and local law enforcement's support for the drug war. In 1984, the DEA launched Operation Pipeline, which trained state and local law enforcement officers to use pretextual stops and consent searches as strategies for drug interdiction. By 2000, the DEA had trained more than 25,000 officers in 48 states in tactics such as using a minor traffic violation as a pretext to stop and search someone, how to lengthen a routine traffic stop and leverage it into a search for drugs, and how to use drug-sniffing dogs to obtain probable cause.⁴⁶ The results of this program are mixed at best, and it is estimated that 95% of Pipeline stops yielded no illegal drugs.⁴⁷ As one former highway patrol officer from California put it, "you had to kiss a lot of frogs before you find a prince."⁴⁸ In hindsight, it is likely that this program wasted both millions of dollars of resources and the time and energy of local and state police departments.

The other federal program instituted was the Edward Byrne Memorial State and Local Law Enforcement Assistance Program, which gave huge cash grants to law enforcement agencies that were willing to make drug law enforcement a top priority in their jurisdictions. The fiscal incentives for the police departments were clear, because not only did they receive free weaponry, training, intelligence, and technical support from the DEA and the Pentagon, but they were also granted the authority to keep the majority of cash and assets they seized in drug raids. A report by the Department of Justice estimated that Byrne-funded drug task forces seized over \$1 billion assets between 1998 and 1992.⁴⁹ SWAT teams began to pop up in every major

⁴⁶ Ricardo J. Bascuas, "Fourth Amendment Lessons from the Highway and the Subway: A Principled Approach to Suspicionless Searches," *Rutgers Law Journal* 38, no.3 (Spring 2007), https://papers.ssrn.com/sol3/papers.cfm?abstract_id=942686.

⁴⁷ Gary Webb, "Driving While Black," *Esquire*, April 1, 1999, <http://www.esquire.com/news-politics/a1223/driving-while-black-0499/>.

⁴⁸ *Ibid.*

⁴⁹ Alexander, 73.

American city, because the police departments suddenly had the money and military equipment to conduct military-like drug raids. By the late 1990s, an overwhelming majority of United States state and local law enforcement agencies had newly available resources, such as intelligence and military weaponry, training, and financial profits from participating in the War on Drugs. The federal government finally had the army it needed to fight its domestic drug war.

The immediate result of these programs is the transition from community policing to military policing in American society. By transforming local police departments into paramilitary forces with access to DEA, Pentagon, and military intelligence, research, weapons, and other equipment for drug interdiction, they became increasingly involved in supply-side drug interdiction operations, despite the fact that drug enforcement is a federally mandated priority. The financial incentives provided by the federal government have not been well publicized, which has led to the reasonably assumed, although false, conclusion that if local police departments report increases in drug arrests, there must be a surge in illegal activity.⁵⁰ As the police became increasingly militarized due to the supply-side based War on Drugs policies, they became, albeit not intentionally, a para-militarized force that focused on drug enforcement more than any other type of crime deemed important to their communities.

Due in part to the success of the federal government in militarizing state and local police, one of the most visible consequences of the War on Drugs policies, especially because of the harsh penalties imposed on drug offenders, has been the explosion in mass incarceration. The number of Americans in jail was relatively stable until the 1970s. However, within the last thirty years, the U.S. penal population has risen from 300,000 to more than 2 million people, with drug convictions accounting for most of those incarcerated.⁵¹ The United States now boasts the

⁵⁰ Alexander, 77.

⁵¹ Marc Mauer, *Race to Incarcerate*, rev. ed. (New York: The New Press, 2006), 33.

highest incarceration rates in the world, 6-10 times greater than those of other liberal, industrialized nations and even higher than repressive regimes like Russia, China, and Iran.⁵² Drug arrests have tripled since 1980, and more than 31 million Americans have been arrested for drug crimes since the War on Drugs began. Drug offenses alone account for over two-thirds of the rise in the federal inmate population and more than half of the rise in state prisoners between 1985-2000.⁵³ There are now more people in prisons in jails today just for drug offenses than were incarcerated for *all* reasons in 1980.⁵⁴ This rapid rise in incarceration rates is unprecedented in history, and coincides almost perfectly with the implementation of supply-side policies introduced in the 1970s.

The vast majority of those arrested are not charged with violent, serious, or high-level offenses. This is evidenced by the fact that by 2005 four out of five drug arrests were made for mere possession, while only one out of five were made for the intent to sell.⁵⁵ The consequence of this phenomenon is that most incarcerated people in prison for drug offenses, especially state prisons, have no history of violence or significant selling activity. Furthermore, this approach clearly does not have an effect on curbing the supply of drugs, because of the focus on users and low-level dealers. For example, drug arrests for marijuana possession on the federal and state level accounted for nearly 80% of the of the drug arrests in the 1990s.⁵⁶ It is unlikely that arresting, convicting, and incarcerating marijuana users and low-level dealers is going to help minimize the supply of drugs that the War on Drugs sought to get rid of, such as cocaine and heroin.

⁵² Ibid.

⁵³ Alexander, 33.

⁵⁴ Alexander, 34.

⁵⁵ Ryan King and Marc Mauer, *The War on Marijuana: The Transformation of the War on Drugs in the 1990s* (New York: Sentencing Project, 2005), 3.

⁵⁶ King and Mauer, 2.

Lastly, the War on Drugs has been an astronomic failure of economic policy. So far, over a trillion dollars has spent on the drug war, although there have been no significant reductions in drug availability, use, and addiction. The government now spends around \$12.6 billion a year to house and care for hundreds of thousands of inmates, a cost of \$25,251 per person annually as compared to the \$10,591 spent to provide public education to a single student.⁵⁷ The social costs of these policies can also not be understated, as roughly seven millions Americans are currently behind bars, on probation, or on parole.⁵⁸ The consequences of having this many people in the criminal justice system – on families, the court system, hospitals, and prisons – cannot be emphasized enough. The War on Drugs persists today. The criminal justice system and law enforcement are still largely ineffective in curbing the overall supply of drugs. Treatment, prevention, and education programs focused on rehabilitation for addicts are still under-funded and under-staffed. The supply-side based, punitive policies spearheaded by the federal government and mimicked by state legislatures have created an American drug policy that has ultimately failed. Understanding the severity of the repercussions of the drug war is necessary in order to explain why the current opioid epidemic, which has been fueled by both federal and state policies, escalated so quickly. Policy makers are now at a critical moment, given the rapid development of the opioid crisis coupled with the failed criminal justice system created by the War on Drugs policies that keep millions of incarcerated and costs taxpayers money each year.

⁵⁷ Buggle, “After 40-Year Fight.”

⁵⁸ Ibid.

Chapter II: The Prescription Opioid Crisis as a Direct Cause of the Opioid Epidemic

“It was sell, sell, sell. We were directed to lie. Why mince words about it? Greed took hold and overruled everything. They saw the potential for billions of dollars and just went after it.”

– Shelby Sherman, former Sales Representative for Purdue Pharma 1974-1998

I. Introduction

The current opioid epidemic can be best understood as a two-part process. It began with the overprescribing of prescription opioids in the late 1990s that in turn led directly to a rapid resurgence in illicit heroin use in the mid 2000s. An epidemic refers to the widespread occurrence of disease in a community at a particular time, and the crisis that has been created in the United States due to pervasive opioid misuse, abuse, and addiction is a prime example of this phenomenon.⁵⁹ The abuse of and addiction to opioids such as heroin, fentanyl, and prescription opioid pain relievers (OPRs) is a serious national issue that effects the health, social, and economic welfare of American society. The scope of the epidemic cannot be understated, considering that over two million Americans suffer from substance abuse disorders related to prescription opioid pain relievers, while an additional 500,000 suffer from heroin addictions.⁶⁰ Furthermore, the most recent available data reports that nearly 64,000 people died of drug overdoses in America in 2016, with synthetic opioids, such as fentanyl and heroin, and common opioid painkillers like OxyContin and Percocet accounting for over half of those overdoses.⁶¹ In an unprecedented, stunning moment in the history of United States public health, drug overdoses now are the leading cause of injury death, resulting in a higher death toll than both gun deaths

⁵⁹ “Epidemic,” Def. 1, *Merriam-Webster Dictionary*, Merriam-Webster, accessed March, 2018, <https://www.merriam-webster.com/dictionary/epidemic>.

⁶⁰ *America’s Addiction to Opioids: Heroin and Prescription Drug Abuse: Before the Senate Caucus on International Narcotics Control, United States Senate*, 113th Cong. (2014) (statement of Nora D. Volkow, M.D.), <https://www.drugabuse.gov/about-nida/legislative-activities/testimony-to-congress/2016/americas-addiction-to-opioids-heroin-prescription-drug-abuse>.

⁶¹ “Overdose Deaths in the United States, 1999-2016,” Centers for Disease Control and Prevention, December 2017, <https://www.cdc.gov/nchs/products/databriefs/db294.html>.

and car crashes. These statistics demonstrate the societal damage caused by the crisis, which began with the aggressive marketing, misinformation, and inappropriate overprescribing of prescription opioid pain relievers. Ultimately, this overprescribing culminated in the creation of an unprecedented demand for opioids that has come to define both waves of the opioid epidemic. In order to fully comprehend the most recent wave of the opioid crisis, it is crucial to briefly trace how the prescription opioid crisis first crafted the supply, and subsequently the demand, for opioids in the 21st century. Only then that policy solutions can be formulated.

II. What are Opioids?

The scope and magnitude of the opioid epidemic has reached epic proportions, and it is necessary to have a basic understanding of what opioids actually *are*, in regards to why their chemical makeup and characteristics make them more susceptible for abuse and addiction than other types of drugs. Simply speaking, opioids are analgesic agents, which means that they are used to relieve or manage moderate to severe pain.⁶² This class of drugs includes the illegal drug heroin (derived from morphine), synthetic opioids such as fentanyl and carfentanil, and legally prescribed pain relievers (OPRs) such as oxycodone (OxyContin), hydrocodone (Vicodin), codeine, and morphine.⁶³ Medically, legal painkillers are primarily prescribed for cancer and chronic pain, and non-medically they are used for their euphoric effects or to prevent withdrawal. Whatever the use of the opioids may be, their most common side effects include itchiness, constipation, nausea, diarrhea, respiratory depression, and sedation.⁶⁴ Going forward, it is useful

⁶² Charles Inturrisi, "Clinical Pharmacology of Opioids for Pain," *Clinical Journal of Pain*, 4, no. 13 (July 2002) 5, <https://www.ncbi.nlm.nih.gov/pubmed/12479250>.

⁶³ "Opioids," National Institute of Drug Abuse, N.d., <https://www.drugabuse.gov/drugs-abuse/opioids>.

⁶⁴ J.C. Ballanyne, "Opioids for Chronic Nonterminal Pain," *South Medical Journal*, 99, no. 11 (November 2006), 1247, <https://www.ncbi.nlm.nih.gov/pubmed/17195420>.

to define the many different forms of opioids as either legal (prescription opioid pain relievers), or illicit (heroin and other synthetic opioids).

Opioids act by binding to specific opioid receptors in the nervous system, although the three classes have differing levels of potency. Unlike over-the-counter painkillers that merely block the production of chemicals in the body that create pain, such as Advil and Ibuprofen, opioids produce their pharmacological effects by acting directly on the central nervous system and brain.⁶⁵ Thus, opioid analgesic effects are unique because they can quickly and intensely mute the propagation of pain signals throughout the body by desensitizing the central nervous system to its own natural opioid system, which then becomes less responsive on its own and can cause one to depend on the drug to produce those needed effects.⁶⁶ Consequently, due to the powerful sense of pain relief and consequent feelings of euphoria that arise when the pain is relieved, opioids have a particular tendency for dependence compared to other classes of drugs.

America's complicated history with regulating the use of both legal and illegal forms of opioids began during the Civil War, when opium and morphine were used as medicine for soldiers, and then were prescribed to the rest of the public for ailments ranging from anxiety to chronic pain. However, the lack of other medications for illnesses and conditions at the time led to rampant narcotic overprescribing, and by 1919 the U.S. Supreme Court set up mechanisms to block doctors and pharmacists from providing morphine to patients.⁶⁷ Subsequently, the abuse of these legal forms of opioids due to overprescribing fell drastically over the next century.

Throughout the 20th century, waves of brief opioid epidemics resulted from increases in illicit

⁶⁵ Christopher Gerry, "Drugs, Data, and Public Policy: What Can Science Teach Lawmakers About the Opioid Crisis," *Science in the News*, October 25, 2016, <http://sitn.hms.harvard.edu/flash/2016/drugs-data-public-policy-can-science-teach-lawmakers-opioid-crisis/>.

⁶⁶ Ibid.

⁶⁷ Peter Katel, "Opioid Crisis: Can Recent Reforms Curb the Epidemic," *CQ Researcher*, October 7, 2016, <http://library.cqpress.com/cqresearcher/document.php?id=cqresre2016100700>.

opioid use, most notably the heroin epidemic of the late 1960s and 1970s in minority-afflicted, poor, urban areas.⁶⁸ Yet, this form of illegal opioid abuse and addiction fell rapidly as the “War on Drugs” began in the 1970s and cocaine and marijuana surpassed heroin in popularity.⁶⁹ As discussed in considerable depth in the next section of this chapter, the creation and propagation of opioid pain relievers, such as OxyContin in the late 1990s, brought about another outbreak of the opioid epidemic, mainly due to the fact that they were legal, and at the time, fairly easy to obtain. Unlike the opioid crisis of the 19th century that also involved legal opioids, this prescription opioid crisis was not efficiently monitored or regulated by any level of government. Consequently, it unequivocally fueled the most current heroin and fentanyl crisis, both of which are illicit opioids.

Taking into consideration that several waves of epidemics have occurred whether the type of opioid involved was legal or not, perhaps the most important characteristic of opioids to keep in mind for the purpose of this thesis is their extremely addictive nature, in both their legal and illicit formulations. Put simply, “opioids are highly addictive because they induce euphoria (positive reinforcement), and the cessation of chronic use produces dysphoria (negative reinforcement).”⁷⁰ The chronic and repeated exposure to opioids through abuse and addiction results in structural and functional changes in regions of the brain that mediate affect, impulse, reward, and motivation.⁷¹ In other words, when opioids act on the brain, they trigger intense

⁶⁸ Refer back to Chapter 1, page 13.

⁶⁹ Andrew Kolodny, et al., “The Prescription Opioid and Heroin Crisis: A Public Health Approach to an Epidemic of Addiction,” *Annual Review of Public Health* 36 (March 2015), https://www.annualreviews.org/doi/full/10.1146/annurev-publhealth-031914-122957?url_ver=Z39.88-2003&rft_id=ori%3Arid%3Aacrossref.org&rft_dat=cr_pub%3Dpubmed.

⁷⁰ J. Upadhyay, et al., “Alterations in Brain Structure and Functional Connectivity in Prescription Opioid-Dependent Patients,” *NCBI* 133, no. 7 (July 2010), <https://www.ncbi.nlm.nih.gov/pubmed/20558415>.

⁷¹ Jared Younger, et al., “Prescription Opioid Analgesics Rapidly Change the Human Brain,” *Journal of Pain* 152, no. 8 (April 2011), https://www.researchgate.net/publication/51087354_Prescription_opioid_analgesics_rapidly_change_the_human_brain.

feelings of pleasure that other types of drugs do not and alter the brain's reward center in such a way that addicts are more likely to engage in further abuse. Furthermore, and after repeated exposure, an addict feels relatively normal when using the drugs and the awful withdrawal symptoms make it particular hard to quit.⁷² Lastly, opioids severely impair a user's self-control, making it physically and psychologically harder to stop using even if the addict wants to. For someone suffering psychologically and physically from an opioid addiction, cheap and readily available illicit opioids, such as heroin and fentanyl, are an obvious choice and hard to say no to.

As discussed, legal prescription opioids are extremely similar, in terms of pharmacological characteristics and side effects, as illegal opioids. However, prescription opioids serve a legitimate medical purpose in the treatment of pain, and "their power to end or diminish pain is unquestioned when a patient has an immediate need, or over the longer term in treating cancer-related pain."⁷³ Therefore, the significance of a sustained-release opioid formulation, such as OxyContin and Percocet, which can be utilized for short-term pain treatment or long-term cancer pain, must be understood and their use in medical practice for these purposes is relatively safe. Nevertheless, there is still a need to be monitoring the use of these drugs. One of the most critical issues regarding the use of opioids for the treatment of these two types of pain is the potential for iatrogenic (illness caused by medical treatment) addiction. There are a number of studies which indicate that the use of opioids for long-term treatment of *chronic* pain can result in misuse and addiction. A recent literature review showed that the prevalence of addiction in patients with long-term opioid treatment for chronic non-cancer-related pain varied from 12% to 50%, depending on the criteria used and the subpopulation

⁷²Associated Press, "Science Says: Why Are Opioids So Addictive," *AP News*, May 2, 2017, <https://www.apnews.com/7615878f9f40487593d99f02e68d96ee/Science-Says:-Why-are-opioids-so-addictive?>.

⁷³ Katel, "Opioid Crisis: Can Recent Reforms Curb the Epidemic".

studied.⁷⁴ These findings are demonstrated in numerous studies by Hoffman et al. (23%), Chabal et al. (34%), Katz et al. (43%), Reid et al. (24%–31%), and Michna et al. (45%).⁷⁵ Furthermore, the Centers for Disease Control and Prevention estimate that one in four people who received prescriptions (legally) like OxyContin currently struggle with an opioid addiction.⁷⁶ While there is some variation in these studies, a general conclusion that can be drawn is that opioids still have abuse potential even when they are being used for medical purposes.

With these considerations in mind, it is not difficult to see why, due to their reputation for addiction and fatal overdoses, most opioids are classified as controlled substances by law. More recently, fentanyl and carfentanil, synthetic opioids that are significantly more addictive than morphine, are making their way into U.S. heroin supplies. Therefore, the addictive chemical nature of opioids is very important to keep in mind when reflecting on what opioids are, and why their unique characteristics have led to the pervasiveness of the crisis. Opiates are, in many ways, the paradigmatic drugs of addiction, and their distinct properties have made the crisis particularly difficult to alleviate compared to other drug epidemics.

III. Brief History of the Prescription Opioid Crisis 1996-2010

Ironically, the root of the prescription opioid crisis stems from another epidemic, namely, the so-called pain epidemic that was addressed when opioid pain relievers were suddenly made widely available to the public. It is estimated that 100 million American adults suffer from either acute or chronic pain, and this pharmacological innovation was considered the “holy grail” for

⁷⁴ Katel, “Opioid Crisis: Can Recent Reforms Curb the Epidemic”.

⁷⁵ Art Van Zee, “The Promotion and Marketing of OxyContin: Commercial Triumph, Public Health Tragedy,” NCBI 99, no. 2 (February 2009): p. 222, <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2622774/>.

⁷⁶ “Overdose Deaths in the United States, 1999-2016,” Centers for Disease Control and Prevention, December 22 2017, <https://www.cdc.gov/nchs/products/databriefs/db294.html>.

some cancer-pain and chronic pain sufferers.⁷⁷ However, this medical breakthrough was distorted and exploited by American prescription opioid manufacturers who oversold the drugs' safety and thereby created a crisis of severe prescription opioid misuse and addiction.

Throughout the first decade of the 21st century, the rate of prescription opioid overdoses quadrupled, making it the worst epidemic in United States history.⁷⁸ The "pain revolution" of the late 20th century, in conjunction with newly highly available opioid pain relievers during the same time period, created a perfect storm of overprescribing, abuse, and addiction that culminated in the prescription opioid crisis of the late 1990s and early 2000s.

The Pain Revolution

One of the most astonishing aspects about the rapid progression of the prescription opioid epidemic is that prior to the mid-1980s, medical treatment with opioids was extremely stigmatized and was basically non-existent. This phenomenon of "opiophobia," in which concern about the risks associated with opioids prevents the medical use of opioid analgesics, in part stemmed from the heroin epidemics of the late 1960s and 1970s of returning Vietnam veterans and in inner-city, poor, urban areas.⁷⁹ Subsequently, physicians were reluctant to prescribe opioid drugs available at the time on a long-term basis for common chronic conditions due to concerns of opioid addiction, tolerance, and physiological dependence that they frequently saw with heroin use.

The "opiophobia" homogeneity among those in the medical profession changed drastically with the publication of one article, Portenoy and Foley's 1986 paper "Chronic Use of

⁷⁷ R.L. Nahin, "Estimate of Pain Prevalence and Severity in Adults: United States, 2012) *Journal of Pain* 16, no. 8 (August 2015), <https://www.ncbi.nlm.nih.gov/pubmed/26028573>.

⁷⁸ Nora Volkow et al., "Medication-Assisted Therapies – Tackling the Opioid-Overdose Epidemic," *New England Journal of Medicine* 370 (May 2014): p. 1, <http://www.nejm.org/doi/full/10.1056/NEJMp1402780>.

⁷⁹ "Opiophobia," Def. 1., *Pain & Policy Studies Group*, University of Wisconsin-Madison, accessed March 2018, <http://www.painpolicy.wisc.edu/glossary/opiophobia>.

Opioid Analgesics in Non-Malignant Pain: Report of 38 Cases”. As the title suggests, the paper describes the treatment of 38 chronic pain patients using opioid pain relievers and concluded that they could be prescribed safely on a long-term basis without a significant chance of addiction.⁸⁰ Despite relatively inconsistent and low-quality evidence, the paper began to become widely cited by other scholars, pain specialists, and medical professionals to support the expanded use of opioids for chronic, non-cancer pain. Although treating long-term pain with opiates went against many long-held beliefs in the medical field, “Foley published what became a declaration of independence for the vanguard of pain specialists interested in using opiates for chronic pain despite other researchers fears that this could be addictive.”⁸¹ What is perhaps most astonishing is that the National Institute of Health, a federal agency, funded the research and publication of this article. For pain specialists, pain organizations, and later opioid manufacturing companies who started to create prescription opioid pain relievers of this kind, this article and its circulation throughout the rest of the medical community opened the floodgates for the pain revolution to begin.

After articles like Portenoy and Foley’s started to persuade doctors, scholars, and other members of the medical field to rethink how pain could be treated, the “pain revolution”, the overall movement in the medical profession to recognize a patient’s right to the assessment and management of pain, started to gain even more momentum from pain organizations and societies. One of the most important developments of this kind was the American Pain Society’s introduction of its “Pain is the 5th Vital Sign” campaign at its annual society meeting in 1995, in which it’s president “encouraged health care professionals to assess pain with the same “zeal” as

⁸⁰ R.K. Portenoy and K.M. Foley, “Chronic Use of Opioid Analgesics in Non-Malignant Pain: A Report of 38 Cases,” *Journal of Pain* 25, no. 2 (May 1986), <https://www.ncbi.nlm.nih.gov/pubmed/2873550>.

⁸¹ Quinones, 92.

they do with vital signs and urged for the more aggressive use of opioids for chronic non-cancer pain” in his opening address.⁸² The fact that pain, measured on a subjective scale of 1 through 10, should be added as another clinical measurement of vital signs that include pulse rate, temperature, respiration rate, and blood pressure, was unprecedented in medical history up to this point in time.

Other well-known and powerful organizations soon followed suit, the World Health Organization (WHO) declared freedom from pain as a “universal right” in 1995, while the Veterans Association (VA) and the Joint Commission on Accreditation of Healthcare Organizations (JCAHO) both adopted the idea of pain as the fifth vital sign by 2000.⁸³ Physicians followed the advice from these organizations and started to treat pain as a serious medical issue by the mid-1990s. This monumental shift in how doctors diagnosed and treated pain was mostly in good faith, considering that millions of Americans suffer from chronic pain. However, what is most astounding about this revolution is that throughout this transformative era, “pain specialists and addiction specialists rarely crossed paths... even today, despite a national movement to treat pain with addictive drugs, the two specialties, remarkably, still don’t have much contact, [and] there are no joint conferences where the two specialties might meet.”⁸⁴ This disconnect is extremely important to note going forward due to the fact that these new types of prescription opioids, which had the capacity be extremely addictive was, at best, unknown by these “pain crusaders,” and at worst, flat-out ignored.

⁸² J.N. Campbell, “American Pain Society Presidential Address,” (lecture, APS, Pain Forum, 1996).

⁸³ Phil Skolnick, “The Opioid Epidemic: Crisis and Solutions,” *Annual Review of Pharmacology and Toxicology* 58 (October 2017): <https://www.annualreviews.org/doi/abs/10.1146/annurev-pharmtox-010617-052534>.

⁸⁴ Quinones, 188.

Purdue Pharma and the Rise of OxyContin

More so than any other pharmaceutical manufacturing company, Purdue Pharma is responsible for taking advantage of the pain revolution to aggressively market their “billion-dollar pill”, OxyContin, which subsequently became the main driver behind the prescription opioid epidemic. The tale of Purdue Pharma and OxyContin is in many ways an American story as old as time: one of a rich, powerful corporation’s greed that ultimately caused unfathomable societal harms against the rest of the population. Purdue Pharma was purchased by the three Sackler brothers in 1952, and it was a relatively small and non-profitable company until it became entrenched in the pain business in the 1970s when they created a time-released morphine pill called MS Contin.⁸⁵ As opiophobia subsided, Richard Sackler, Raymond Sackler’s son who was one of the executives of Purdue Pharma following his father’s retirement, started to search for new applications for Purdue’s time-released Contin system, as morphine had a negative stigmatization as a “dying” drug.⁸⁶ The result was OxyContin, the brand-name drug for the extended-release formulation of oxycodone. OxyContin quickly made the Sackler family billions of dollars as it was the first pharmaceutical company to achieve a dominant share of the new market for long-acting opioids. As the Sackler family became rich, millions of Americans started to suffer from addiction, overdose, and overdose deaths due to their marketing strategies.

OxyContin is a simple pill. It contains only one drug, oxycodone, a semisynthetic opioid molecularly similar to heroin that produces similar euphoric effects to other types of opioids.⁸⁷ At the time, Purdue’s use of the Contin system, which gradually released oxycodone over a

⁸⁵ Christopher Glazek, “The Secretive Family Making Billions from the Opioid Crisis,” *Esquire*, October 16, 2017, <https://www.esquire.com/news-politics/a12775932/sackler-family-oxycontin/>.

⁸⁶ *Ibid.*

⁸⁷ “Palliative Care, Opioid Conversion, Equivalency Table,” Stanford School of Medicine, 2018, <https://palliative.stanford.edu/opioid-conversion/>.

period of twelve hours, was seen as a key innovation as it meant that people only had to take two pills a day instead of six or eight.⁸⁸ Moreover, due to the long-lasting nature of the opioid, OxyContin was formulated in incredibly high doses, up to 80 and 160 mg.⁸⁹ However, in terms of abuse, OxyContin could be easily crushed, snorted, or injected and the person using it would then receive all of the oxycodone at once. This factor paved the way for it to soon become the most widely abused prescription opioid.⁹⁰ Other opiate painkillers, such as Vicodin and Percocet, are combined with either acetaminophen or Tylenol, which makes them hard to liquefy or inject.⁹¹ Yet even *those* were abused. OxyContin's extremely high doses coupled with the fact that it's only ingredient is oxycodone was the first of its kind in the medical field. These qualities make it clear as to how a drug similar to heroin, that began to be prescribed basically like an over-the-counter medication, became so popular for misuse and abuse and subsequently the main force behind the prescription opioid epidemic.

Purdue Pharma released OxyContin on the market in 1996, and by that time the pain revolution had been changing the minds of American medical professionals for over a decade. Thus, Purdue Pharma and other similar opioid manufacturing companies began to market their products aggressively. From 1996 through 2002, Purdue Pharma funded more than 20,000 pain-related educational programs for prescribers through direct sponsorship or financial grants, and also launched a multifaceted campaign to encourage the long-term use of opioid pain relievers

⁸⁸ United States General Accounting Office, *Prescription Drugs: OxyContin Abuse and Diversion and Efforts to Address the Problem, Report to Congressional Requesters*. H.R. Rep. 108th 2003, <https://www.gao.gov/new.items/d04110.pdf>.

⁸⁹ Van Zee, 224.

⁹⁰ T.J. Cicero, J.A. Inciardi, and A.J. Munoz, "Trends in Abuse of OxyContin and Other Opioid Analgesics in the United States: 2002-2004," *Journal of Pain* 6, no. 10, (October 2005): <https://www.ncbi.nlm.nih.gov/pubmed/16202959>.

⁹¹ Quinones, 125.

for chronic non-cancer pain.⁹² In theory, it would be assumed that these types of programs would have been extremely helpful for doctors, as this was a new type of drug that had never been widely prescribed before. However, Purdue representatives routinely presented false evidence about the efficacy of using opioids for chronic non-cancer related pain. For example, they told doctors that the likelihood of addiction for patients prescribed opioids for long-term use was less than 1%.⁹³ As recent studies have shown, that probability is more like 23 to 45%.⁹⁴ Pain specialists, doctors, and scholars were also offered perks to present this false evidence⁹⁵, and it is likely that this type of pharmaceutical company symposium greatly influenced physicians' prescribing habits.

In addition to flooding the medical field with misinformation about the effectiveness and addictive tendencies of OxyContin, Purdue also launched a high-cost promotion strategy that provided substantial financial support to pain organizations and groups such as the American Pain Society, the American Academy of Pain Medicine, the Federal and State Medical Boards, and pain patient group. In turn, these groups all advocated for more aggressive identification and treatment of pain, and of course the use of opioid pain relievers for all types of pain management.⁹⁶ Another component of this campaign was to provide “kickbacks” to the entire OxyContin’s distribution chain, meaning that “wholesalers got rebates in exchange for keeping OxyContin off prior authorization lists (which requires routine clinical coverage reviews based on medical necessity for the drug being prescribed). In addition, pharmacists got refunds “on their initial orders, patients got coupons for thirty-day starter supplies, academics got grants,

⁹² United States General Accounting Office, *Prescription Drugs: OxyContin Abuse and Diversion and Efforts to Address the Problem, Report to Congressional Requesters*. H.R. Rep. 108th 2003, <https://www.gao.gov/new.items/d04110.pdf>.

⁹³ Katel, “Opioid Crisis: Can Recent Reforms Curb the Epidemic.”

⁹⁴ Refer back to Chapter 2, page 25.

⁹⁵ Quionones, 76.

⁹⁶ Kolodny, 562.

medical journals got millions in advertising, [and] Senators and members of Congress on key committees got donations from Purdue and from members of the Sackler family.”⁹⁷ Offering freebies to doctors and other members of the medical profession was not necessarily uncommon in the pharmaceutical industry. However, this level of false advertising, marketing, and information had never been seen before in the promotion of a highly addictive, Schedule II narcotic.

Another key part of Purdue’s marketing strategy was to expand the number of its internal sales representatives, whose job was to persuade physicians to prescribe OxyContin not only for chronic pain, but for basically any pain ailment, including toothaches and minor migraines. From 1996 to 2000, Purdue increased its internal sales force from 318 to 671, and its total physician call list from 33,4000 to 94,000 physicians.⁹⁸ They specifically targeted certain geographical regions, such as Rustbelt areas that were suffering from high rates of unemployment due to post-industrialization, where the proclivity for abuse was high. From 1998 through 2000, in areas such as West Virginia, eastern Kentucky, southwestern Virginia, and Alabama, hydrocodone and oxycodone were being prescribed 2.5 to 5.0 times more than the national average.⁹⁹ It is these areas that were, and still are, most deeply affected by the opioid epidemic.

The profit made from Purdue Pharma’s aggressive marketing strategy is staggering. In 1996, its first year on the market, OxyContin’s annual sales totaled \$48 million dollars.¹⁰⁰ By 2010, that number was up to \$3.1 billion dollars, and accounted for over 30% of the entire analgesic (pain relievers) market.¹⁰¹ By the 21st century, OxyContin had become the most

⁹⁷ Glazek, “The Secretive Family Making Billions from the Opioid Crisis.”

⁹⁸ United States General Accounting Office, “Prescription Drugs.”

⁹⁹ Van Zee, 226.

¹⁰⁰ Van Zee, 225.

¹⁰¹ Ibid.

frequently prescribed branded opioid for treating moderate to severe pain – and the availability of high doses of this potent opioid likely contributed to its popularity for misuse. In terms of monetary profit, OxyContin could not have been a greater success.

As these statistics demonstrate, the false advertising, miseducation, and inappropriate marketing of OxyContin by Purdue Pharma clearly had a great effect on the physicians prescribing it. For the most part, these physicians were well-meaning doctors and nurses who were given incorrect information about how dangerously addictive this prescription drug could be. Primary care physicians (PCPs) were particularly targeted by Purdue’s promotional campaigns, educational programs, and sales representatives, and subsequently became the main prescribers of OxyContin. In fact, by 2003, more than half of the prescribers of OxyContin were PCPs, despite the fact that they had limited training in pain management.¹⁰² Furthermore, Purdue had a database that helped sales representative identify both physicians with large numbers of chronic pain patients and also the most frequent prescribers of opioids.¹⁰³ Doctors were persuaded to treat pain as a serious medical issue, and there is good reason for that considering chronic pain is absolutely debilitating for sufferers. However, the pharmaceutical industry’s role and influence in medical education, especially for an entirely new kind of drug, is undoubtedly problematic.

Another shocking aspect about the rapid rise of OxyContin is the overall lack of oversight by federal agencies such as the FDA. Ironically, OxyContin’s twelve hour long-lasting formula is what led FDA officials to initially believe that it would be “less attractive to abusers since

¹⁰² Quinones, 138.

¹⁰³ Sheryl Gay Stolberg and Jeff Gerth, “High-Tech Stealth Being Used to Sway Doctor Prescriptions,” *The New York Times*, November 16, 2000, <http://www.nytimes.com/2000/11/16/us/high-tech-stealth-being-used-to-sway-doctor-prescriptions.html>.

absorption of the drug would be delayed.”¹⁰⁴ Of course, this line of thinking did not take into account that OxyContin could be easily crushed, snorted, or injected by abusers to receive all twelve hours of oxycodone at once. However, once again the real blame can be attributed to Purdue Pharma. Purdue regularly distributed copies of OxyContin promotional videos, most notably to 15,000 to physicians in 1998, without submitting it to the first FDA for review.¹⁰⁵ By 2001, Purdue submitted a second version of the video to the FDA, yet it did not review it until October of 2002, when it concluded that it minimized the risks of OxyContin and made unsubstantiated claims regarding its benefits.¹⁰⁶ The combination of an aggressive marketing strategy, misinformation for prescribers, and an overall lack of oversight all contributed to the rapid spread of OxyContin throughout the United States.

Immediate Consequences: Societal Harms and Policies

The consequences of flooding American society with an extremely addictive drug, and declaring it as the cure for basically any type of pain under the sun, started to appear almost immediately after OxyContin’s release in 1996. From 1997-2011, there was a 900% increase in individuals seeking treatment for addiction to opioid pain relievers and as of 2014, OxyContin was still the most widely prescribed opioid with an estimated 245 million prescriptions dispensed, almost enough for each person in the United States to have a bottle.¹⁰⁷ Today, more than 4% of the adult American population currently misuses prescription opioids, and roughly \$80 billion of U.S. taxpayers’ dollars is spent annually on the societal costs of prescription opioid use, including criminal justice, correctional, and policing costs.¹⁰⁸ In terms of supply and

¹⁰⁴ United States General Accounting Office, *Prescription Drugs*.

¹⁰⁵ United States General Accounting Office, *Prescription Drugs*.

¹⁰⁶ Ibid.

¹⁰⁷ Skolnick, 149.

¹⁰⁸ Alpert, Powell, and Pacula, 7.

demand, the creation, marketing, and distribution of OxyContin by companies like Purdue Pharma *created* the demand for prescription opioids by saturating the market with a large supply of legal, easily-prescribed, and highly addictive drugs that were basically non-existent prior to the release of OxyContin in 1996. In this light, by creating the highest supply and demand for opioids in centuries, opioid manufacturing companies bear the most responsibility in proliferating the prescription opioid crisis.

In terms of legal recourse, there have been multiple lawsuits brought against Purdue Pharma by both states and individuals. One of the most noteworthy cases was settled in 2007, when Purdue pleaded guilty to misleading users about the risk of addiction with OxyContin use, which led to an over \$600 million settlement for criminal and civil charges. Individual executives also paid \$34.5 million out of their own pockets and performed four hundred hours of community service.¹⁰⁹ This settlement was among the largest in the history of the pharmaceutical industry at the time. While this monetary settlement may seem greatly inadequate, considering that a quarter of a million people have died from prescription opioid overdoses since 1996, it is a step in the right direction. More and more lawsuits are being brought against pharmaceutical companies every year, and it is likely that in the next coming years more companies, executives, and sales representatives will be held accountable.

In regards to immediate policy responses, the adverse consequences of the overprescribing of opioid pain relievers were not noticed on a wide-scale range until about fifteen years after OxyContin was released. As will be discussed in the next chapter in more depth, there have been two significant policy responses to the crisis since then. First, in 2010, OxyContin was reformulated in an “abuse-deterrent” design, which made it mostly impossible

¹⁰⁹ Alpert, Powell, and Pacula, 8.

for addicts to abuse.”¹¹⁰ The second response was by individual states, 23 of which started to pass prescribing limits legislation in 2016. Most of these legislative efforts limit first-time opioid prescriptions to a specific number of days’ supply, while others also set dosage limits.¹¹¹ In a more symbolic response, the American Medical Association (AMA) recently recommended that pain be removed as the 5th vital sign¹¹², and the Center for Disease Control (CDC) added opioid prescription overdose prevention to its list of top five public health challenges of 2013.¹¹³ While mostly rhetorical, these changes will hopefully set the tone for the rest of the medical field, as they did previously with the pain revolution.

In February 2018, Purdue Pharma announced that it would stop marketing opioid drugs to doctors. This drastic move came about amid a series of state and municipal lawsuits that blame the company for contributing to the opioid epidemic, and the company promised to cut its sales force by more than 50%.¹¹⁴ This is a monumental step, however, it may have come a little too late. Mainly due to reformulation and prescribing limits, the misuse and abuse of prescription opioids has gradually declined from a high of 2.7 million nonmedical users in 2002, to 1 million users in 2012.¹¹⁵ While the prescription portion of the epidemic seems to have been reduced to a great degree do to these policies, they have unfortunately contributed to the next part of the

¹¹⁰ Skolnick, 11.4.

¹¹¹ “Prescribing Policies: States Confront Opioid Epidemic,” NCSL, September 8, 2017, <http://www.ncsl.org/research/health/prescribing-policies-states-confront-opioid-overdose-epidemic.aspx>.

¹¹² Skolnick, 11.4.

¹¹³ United States Department of Health and Human Services, Centers for Disease Control and Prevention, “CDC’s Top Ten: 5 Health Achievements in 2013 and 5 Health Threats in 2014,” *Centers for Disease Control and Prevention*, December 16, 2013, <https://www.cdc.gov/media/releases/2013/p1216-eoy2013.html>

¹¹⁴ Phil Mccausland and Connor Tracy, “OxyContin Maker Purdue to Stop Promoting Opioids in Light of Epidemic,” *NBC*, February 10, 2018, <https://www.nbcnews.com/storyline/americas-heroin-epidemic/oxycontin-maker-purdue-stop-promoting-opioids-light-epidemic-n846726>.

¹¹⁵ United States Department of Health and Human Services, Substance Abuse and Mental Health Services Administration, *Results from the 2013 National Survey on Drug Use and Health: Summary of National Findings*, SAMHSA: Substance Abuse and Mental Health Services Administration, 2014, <https://www.samhsa.gov/data/sites/default/files/NSDUHresultsPDFWHTML2013/Web/NSDUHresults2013.pdf>.

opioid epidemic: the heroin and fentanyl crisis. The next chapter will go into further discussion about how, and why, the curbing of prescription opioid availability, use, and addiction inadvertently led to the second wave of the opioid epidemic.

Chapter III: The Heroin and Fentanyl Epidemic and Current Federal Policy Responses

“The terrorist threat families in America see is not in the streets of Aleppo. It’s fentanyl coming down your street” – Senator Ed Markey, Speech at the National Rx Drug Abuse & Heroin Summit, March 2016

I. Introduction

At its core, the opioid epidemic is an epidemic of addiction. As discussed in Chapter One, the economic theory of supply and demand predicts that “policies which reduce the supply of drugs – through mechanisms such as enforcement, monitoring, and interdiction – should increase drug prices and diminish their availability, lowering the overall demand for the drug.”¹¹⁶ However, this reasoning does not account for the addictive nature of drugs. Even if a supply-side strategy was successful in completely eradicating the “supply” of a drug, the “demand” (the addicted users) still remains. More often than not, drug users then turn to substitute drugs when the initial supply becomes unavailable in order to feed their addiction. This phenomenon becomes even more complicated in terms of the opioid epidemic, due to the fact that both legal and illegal opioids are abused and are particularly subject to extremely high rates of addiction.

Given the severity of the epidemic, there has been a major effort by the federal and state governments to address it, most of which have consisted of supply-side based responses. Despite the relative ineffectiveness of these approaches, supply-side interventions for opioid abuse have continued to dominate the political discourse surrounding drug policy. While these policies have reduced the availability of legal prescription opioids, they have also directly caused the second phase of the crisis. The presence of substitutes, in this case widely available and cheap heroin and fentanyl, limits the scope for these types of supply-side interventions to effectively reduce the overall misuse and abuse of opioids, even if they are initially successful in targeting one

¹¹⁶ Jonathon Caulkins and Peter Reuter, “How Drug Enforcement Affects Drug Prices,” *Crime and Justice* 39 (2010): 224, <https://www.journals.uchicago.edu/doi/abs/10.1086/652386>.

specific type of the drug (i.e. prescription opioids) in the supply chain. There is currently no end in sight for this next phase of the opioid crisis, due to the implementation of supply-side policies that are aimed solely at the prescription side of the epidemic and incompetent leadership on the federal level. By evaluating how these strictly supply-side drug policies have led directly to the rapid increase in heroin and fentanyl use, this chapter will make it clear why a combination of both supply-side and demand-side based strategies is necessary to successfully curtail the opioid epidemic.

II. Prescription Opioid Crisis Policy Responses and Immediate Consequences

In an unfortunate, ironic, twist of fate, the policy responses put in place to curb the prescription opioid epidemic inadvertently caused the next wave of the crisis, which is mainly driven by the rampant use of heroin and fentanyl. The damaging consequences of the prescription opioid epidemic were first recorded on a wide-scale around 2010. Subsequently, two significant supply-side policies were quickly implemented that focused on immediately eliminating the supply of prescription opioid pain relievers available on the legal and illegal markets. These two policy responses included the reformulation of the legal opioid responsible for initiating the crisis, OxyContin, into an abuse-deterrent form, and the implementation of individual state prescribing limits for prescription pain relievers. These strategies were overall successful in reducing the amount of prescription opioid abuse, considering the abuse rate for opioid pain relievers decreased from .56 per 100,000 of the population to .35 per 100,000 of the population between 2010 and 2013.¹¹⁷ However, this exceptionally unique supply disruption, in which almost the entire production of opioid pain relievers was discontinued practically

¹¹⁷ Richard C. Dart et al., “Trends in Opioid Analgesic Abuse and Mortality in the United States,” *New England Journal of Medicine* 372 (January 2015): 243, <http://www.nejm.org/doi/full/10.1056/NEJMsa1406143>.

overnight, led to a sudden negative supply shock of abusable prescription opioids. Consequently, many addicts, whose “demand” still required a fix, turned to heroin as a readily available substitute.

Reformulation

Following the unprecedented increase in prescription opioid availability, misuse, and addiction throughout the late 1990s and early 2000s, the FDA approved the reformulation of OxyContin into an “abuse-deterrent” design in 2010. The new formulations were either physical (e.g. a viscous gel was formed when crushed), or chemical (e.g. a low dose of an opioid antagonist was incorporated in the formulation and released upon crushing).¹¹⁸ Both the physical and chemical formulations aimed to discourage misuse by addicts who crushed the pill for injection or inhalation purposes, the two most common forms of abuse. As one addict put it, “Oxy was getting harder and harder to get, and the pills you could get, most of them would just ‘gel-up’.”¹¹⁹ In matter of a few months, OxyContin, the main prescription opioid pain reliever on the market, became almost impossible for addicts to acquire and abuse.

The reformulation of OxyContin would not have been possible without the efforts of federal and state officials, who pressured opioid manufacturing companies like Purdue Pharma to design an abuse-deterrent formula, and the FDA, which ultimately approved the formulation. However, the government and its agencies did not consider that although this strategy helped diminish prescription abuse, a large disruption to the supply of abusable opioids had the unintended consequence of leading millions of addicts to turn to more dangerous and potent opioids as substitutes, most commonly heroin. The correlation between the sudden decrease in

¹¹⁸ Skolnick, 11.2

¹¹⁹ Theodore Cicero, et al., “The Changing Face of Heroin Use in the United States: A Retrospective Analysis of the Past 50 Years,” *Journal of the American Medical Association: Psychiatry* 71, no. 7 (July 2014): 823, <https://www.ncbi.nlm.nih.gov/m/pubmed/24871348/>.

prescription opioid availability and the increase in heroin use has been documented in a groundbreaking study by Alpert et al., which found that “states with higher pre-2010 rates of OxyContin misuse experienced large differential increases in heroin deaths immediately after reformulation, potentially due to the substitution towards other opioids, including more harmful synthetic opioids such as fentanyl.”¹²⁰ These results indicate that a substantial share of the dramatic increase in heroin deaths since 2010 can be attributed to the reformulation of OxyContin.

This is not to say that every person addicted to prescription opioids switched to heroin use, especially considering the social costs associated with acquiring and using illegal drugs, such as coming into regular contact with drug dealers and the uncertainty of illicit heroin’s chemical makeup. Nevertheless, the available literature does demonstrate that a significant portion of the prescription opioid addicted population did switch to non-medical, illicit options. For example, a study by Cicero and Ellis found that 70% of their interviewed subjects responded to the abuse-deterrent formulation by switching to heroin use.¹²¹ Furthermore, it has been repeatedly documented that four out of five (80%) of current heroin users began their addictions with the abuse of prescription opioids.¹²² These statistics highlight the common misconception that in terms of addictive drugs, getting rid of one supply is *not* going to subsequently decrease the demand.

It could be argued that the amount of heroin overdose deaths started to spike around 2010 solely because of the introduction of fentanyl, an extremely potent synthetic opioid, into the U.S. heroin supply. However, heroin overdose deaths were not correlated with OxyContin misuse

¹²⁰ Alpert, Powell, and Pacula, 4.

¹²¹ T.J. Cicero and M.S. Ellis, “Abuse-Deterrent Formulations and the Prescription Opioid Abuse Epidemic in the United States: Lessons Learned from OxyContin,” *Journal of the American Medical Association: Psychiatry* 72, no. 5 (May 2015), <https://www.ncbi.nlm.nih.gov/pubmed/25760692>.

¹²² C.M. Jones, “Heroin Use and Heroin Use Risk Behaviors Among Nonmedical Users of Prescription Opioid Pain Relievers – United States, 2002-2004 and 2008-2010,” *Journal of Drug and Alcohol Dependence* 132 (September 2013), <https://www.ncbi.nlm.nih.gov/pubmed/23410617>.

prior to the reformulation. This is evidenced by the fact that heroin-related overdoses more than tripled between 2010 to 2014 from 1.0 to 3.4 deaths per 100,000, after remaining relatively constant between 1999 and 2010.¹²³ In other words, it is likely that the main reason for the increase in heroin use, and consequently heroin overdose deaths, was because prescription opioids became less available for abuse following reformulation in 2010. Furthermore, as discussed in more depth in the next section of this chapter, fentanyl did not become regularly injected in to the U.S. heroin supply until around 2013, three years after the reformulation of OxyContin. While this opioid policy disrupted virtually the entire supply of prescription opioids for nonmedical use, the availability of unregulated substitute drugs severely undermined the effectiveness of this particular strategy.

State Prescribing Limits

As federal government agencies like the FDA pressured the pharmaceutical companies to reformulate OxyContin into an abuse-deterrent form, individual states also began to take action in an attempt to reduce the prescription opioid epidemic by instituting their own state prescribing limits. As previously mentioned, the false information provided to doctors by pharmaceutical companies resulted in primary care physicians to become the leading prescription opioid prescribers. Consequently, the amount of opioids prescribed in 2010 was more than three times higher than in 1999.¹²⁴ However, once studies and research began to show high rates of misuse and addiction among both medical and nonmedical prescription opioid users, the CDC released its “Guidelines for Prescribing Opioids for Chronic Pain” in 2016, which offered primary care providers a set of voluntary, evidence-based recommendations for prescribing opioids to

¹²³ Alpert, Powell, and Padula, 5.

¹²⁴ J.P. Guy Jr. et al. “Vital Signs: Opioid Prescribing in the United States, 2006-2015,” *Morbidity and Mortality Weekly Report* 66, no. 26 (July 2017): 701, <https://www.cdc.gov/mmwr/volumes/66/wr/mm6626a4.htm#suggestedcitation>.

patients.¹²⁵ These guidelines were soon adopted by state governments, many of which started to pass legislative limits on opioid prescriptions around 2016.

Massachusetts was the first state to set prescribing limits in early 2016, and soon other states that have been disproportionately affected by the opioid crisis began to follow suit. As of today, twenty-three states have passed laws that include some type of limit, guidance, or requirement related to opioid prescribing.¹²⁶ Most of this legislation limits first-time opioid prescriptions to a certain number of days' supply, with seven days being the most common.¹²⁷ In some cases, states also set dosage limits, and nearly half of these states set limits that apply to treating acute pain, as differentiated from chronic pain.¹²⁸ Many states also included exemptions for the use of prescription opioids for the treatment of cancer or palliative pain, as studies have shown very low addiction rates for the shorter-term treatment of these types of ailments.

Again, similar to the reformulation of OxyContin, these policies had an immediately positive effect on prescription opioid abuse in the United States. While prescriptions for opioid analgesics increased steadily from 2002 to 2012, they started to decrease in 2016, the year that states started to implement their own prescribing limits. This phenomenon is substantiated by the fact that the overall national opioid prescribing rate dropped from 81.3 to 66.5 prescriptions for 100 persons within that same timeframe.¹²⁹ Furthermore, although the data is preliminary, the amount of overdoses and overdose deaths relating to prescription opioids, as opposed to illicit opioids, has also decreased since 2016.¹³⁰ Yet, again the lower rates must be considered within

¹²⁵ "CDC Guidelines for Prescribing Opioids for Chronic Pain – 2016," Centers for Disease Control and Prevention, Marc 18, 2016, <https://www.cdc.gov/mmwr/volumes/65/rr/rr6501e1.html>.

¹²⁶ "Prescribing Policies: States Confront Opioid Epidemic," NCSL, September 8, 2017, <https://www.ncsl.org/research/health/prescribing-policies-states-confront-opioid-overdose-epidemic.aspx>.

¹²⁷ *Ibid.*

¹²⁸ *Ibid.*

¹²⁹ Dart, 244.

¹³⁰ "CDC Guidelines for Prescribing Opioids for Chronic Pain – 2016," Centers for Disease Control and Prevention.

the wider context of the entire opioid epidemic. It is likely that the state prescribing limits prevented many addicts from obtaining prescription opioids and severely limited the amount of opioid painkillers available on both the legal and illegal markets. Subsequently, as seen with the reformulation of OxyContin, state prescribing limits also contributed to the unintended rise in heroin and fentanyl use starting around 2016.

Consequences of the Rise in Heroin and Fentanyl Use

Although pharmacologically similar to prescription opioids, illicit heroin and fentanyl use presents some greater risks in terms of the likelihood of an overdose or overdose fatality. This is mainly because unlike legal prescription opioids, heroin is illegal, and therefore there is a “lack of control over the purity of the drug and its potential adulteration with other drugs. In the case of adulteration with highly potent opioids such as fentanyl or carfentanyl, this can be particularly deadly.”¹³¹ As the availability of prescription opioids diminished due to the policies outlined above, many users consequently turned to heroin as a substitute for their opioid addictions. Heroin has been a persistent issue for decades in American drug policy, however, this problem has recently reemerged at extremely high rates. Recent reports from the DEA highlight a 143% increase in heroin seizures between 2010 and 2015, while the heroin price per milligram has declined to historically low levels.¹³² The combination of a wider availability and lower costs has likely also played a role in the increase of heroin use. Furthermore, because this cheap and available heroin has become the main substitute for prescription opioids, the supply is likely to remain pretty consistent as long as the demand (the number of users) stays the same. This

¹³¹ *Research on the Use of Misuse of Fentanyl and Other Synthetic Opioids: Before the House Committee on Energy and Commerce, Subcommittee on Oversight and Investigations, United States House of Representatives, 115th Cong.* (2017) (statement of Wilson M. Compton, M.D., NIDA Deputy Director), <https://www.drugabuse.gov/about-nida/legislative-activities/testimony-to-congress/2017/research-use-misuse-fentanyl-other-synthetic-opioids>.

¹³² United States Department of Justice, Drug Enforcement Administration, *National Heroin Threat Assessment Summary*, Drug Enforcement Administration, June 2016, https://www.dea.gov/divisions/hq/2016/hq062716_attach.pdf.

positive supply shock of heroin in the United States demonstrates that as the supply of prescription opioids disappeared, illicit opioids such as heroin started to increase in order to meet the demand of the addicted users.

Perhaps even more troubling than the increase in heroin use alone is the recent injection of illicitly manufactured fentanyl as a “filler” into the U.S. heroin supply. From 2013 to 2015, the number of fentanyl seizures by the DEA increased from 1,000 to 13,000, the largest DEA drug seizure increase in American history.¹³³ Fentanyl is a powerful synthetic opioid that is 30-50 times more potent than heroin, which is available legally as a prescription, primarily for anesthesia and treating post-surgical pain.¹³⁴ It is highly fat-soluble, which allows it to rapidly enter the brain, leading to a faster and more intense onset of its effects than heroin.¹³⁵ This high potency and quick onset makes fentanyl users particularly susceptible to extreme withdrawal symptoms, as well as overdoses and overdose deaths. Thus, it is extremely likely that fentanyl now plays a major role in the rising mortality rates involving heroin or other opioid overdoses.

The rise of fentanyl use reflects the drug’s potency and low production costs. While heroin, already considered a relatively inexpensive drug, costs about \$65,000 per kilogram wholesale, illicit fentanyl is available at about \$3,500 per kilogram.¹³⁶ Moreover, one kilogram of illicit fentanyl, again far cheaper than heroin or oxycodone, can produce one million counterfeit pills, netting between \$10 to \$20 million in revenue.¹³⁷ Therefore, there is a high monetary incentive for drug dealers to “fill” their heroin and other street drug supplies with

¹³³ Compton, 6.

¹³⁴ Compton, 5.

¹³⁵ Ibid.

¹³⁶ Richard G. Frank, “Addressing the Fentanyl Threat to Public Health,” *New England Journal of Medicine* 376, no. 7 (February 2017): 605, <http://www.nejm.org/doi/full/10.1056/NEJMp1615145>.

¹³⁷ Katie Zezima, “Counterfeit Opioid Pills are Tricking Users,” *The Washington Post*, November 19, 2017, https://www.washingtonpost.com/national/counterfeit-opioid-pills-are-tricking-users--sometimes-with-lethal-results/2017/11/19/d34edb14-be4b-11e7-8444-a0d4f04b89eb_story.html?utm_term=.2e853400da8e.

fentanyl in order to drastically increase their profits. However, “producing precise fentanyl doses requires specialized equipment and knowledge, and street-level dealers who are unwilling or unable to provide precise dosing create especially acute overdose risks.”¹³⁸ In other words, because fentanyl is so incredibly potent, most drug dealers are unaware of how much of it can cause an overdose.

In terms of human costs, this wave of the epidemic is reaching historically disastrous proportions. Because fentanyl is most commonly mixed in with a heroin supply, most users are unaware that they are using it, which is of course more powerful than heroin used alone. As one user put it, “now the dope is fentanyl and its killing people left and right... over the years I’ve watched friends [die from an overdose], but on average it was three a year. Now the last three years it’s been an average of 20.”¹³⁹ This observation is becoming all too common, and emphasizes the time sensitivity aspect of dealing with the crisis. Unlike, say alcoholism, which usually does not prove fatal until permanent organ damage develops over a few decades, fentanyl is so incredibly potent that it is causing multitudes of addicts to overdose and die every single day. National overdose deaths attributed to fentanyl began to increase in 2013 from a stable level of approximately 1,600 annually in 2010-2012 to 1,905 in 2013, and then by a further 120% to 4,200 in 2015.¹⁴⁰ As these statistics demonstrate, fentanyl-infused heroin overdoses are continuing to rise with no signs of abating, and it is unlikely that it will any time soon due to the non-existent supply of prescription opioids, and the nuanced, ineffective responses from the federal and most state governments.

¹³⁸ Frank, 605.

¹³⁹ Daniel Ciccarone, Jeff Ondocsin, and Sarah Mars, “Heroin Uncertainties: Exploring Users’ Perceptions of Fentanyl-Adulterated and -Substituted ‘Heroin’,” *International Journal of Drug Policy* 46 (2017): 150, [http://www.ijdp.org/article/S0955-3959\(17\)30167-6/abstract](http://www.ijdp.org/article/S0955-3959(17)30167-6/abstract).

¹⁴⁰ M. Warner et al., “Drugs Most Frequently Involved in Drug Overdose Deaths: United States, 2010-2014,” *National Vital Statistics Report* 65, no. 10 (December 2016): 10, <https://www.ncbi.nlm.nih.gov/pubmed/27996932>.

III. Current Executive and Congressional Policy Responses the Opioid Epidemic

The opioid epidemic has become an increasingly relevant topic of interest throughout the last two presidential administrations. Yet, despite the unique dangers presented by this crisis that have been outlined above, American drug policy has been “frozen in place since crack cocaine hit the cities in the mid 1980s.”¹⁴¹ This is mainly due to the failed War on Drugs supply-side policies and inconsistent leadership on the federal level. The Obama administration was successful in instituting a shift in the rhetoric surrounding addiction and implemented critical first steps in health care reform that have positively impacted addicts. However, the Trump administration is now aiming to derail that progress. The current federal push to return to a “law and order” approach for drug policy, discoordination between the government and federal drug agencies, lack of political discussion aimed at demand-side policies, and plans to reshape the health care system are of particular concern. Considering this type of approach led to the failed drug war policies, it is crucial to discuss the policies that have been recently implemented in order to demonstrate why little headway is being made, in spite of the extensive amount of national attention now given to the epidemic.

Obama Administration

Because the opioid epidemic has been an ongoing crisis since the early 2000s, some critics contend that Obama did not do enough throughout his presidency to address it, as he did not speak publically about the crisis until his last two years in office. However, before instituting a national drug policy that could focus more on demand-side initiatives than supply-side strategies, first his administration had to reform the failing health care system in a way that would subsidize drug addiction as a *disease* which could be included under regular medical

¹⁴¹ Reuter, “Limits of Supply-Side Drug Control”.

coverage. President Obama did institute several significant changes in the health care system, most notably the passing of the Affordable Care Act which had some positive effects on addicts. Unfortunately, many of these efforts were routinely blocked by Congress and likely weakened the overall success of these policies. For example, despite his efforts, during his two terms the amount of overdose deaths nearly doubled, from 36,450 in 2008 to more than 63,600 in 2016.¹⁴² That being said, there are a few noteworthy reforms, specifically within the U.S. health care system, that have, and continue to, provide more treatment, rehabilitation, and coverage for opioid addicts.

In Obama's first year in office, Congress narrowly passed the Mental Health Parity and Addiction Act, which greatly improved insurance coverage for people suffering from mental health and addiction disorders. Historically, addiction treatment has been characterized as a "behavioral" health issue, which is not covered well under regular medical health insurance. However, this act "require[s] parity (equality) in coverage (benefits for mental health and substance abuse), often referred collectively as "behavioral health," that are equivalent to all other medical and surgical benefits.¹⁴³ In other words, this act was a crucial step in altering the U.S. health care system in a way that ensures health insurance plans would treat substance use disorders the same way as they treat other medical conditions, mainly by requiring more accountability in payer practices.¹⁴⁴ Unfortunately, the impact of this legislation is mostly negligible, as the law did not apply to the large proportion of self-insured employers and

¹⁴²Jerry Mitchell, "Obama Gets a D-minus, Trump an F for Work on Opioid Epidemic, Expert Says," *The Clarion Ledger*, February 9, 2018, <https://www.clarionledger.com/story/news/2018/02/09/obama-gets-d-trump-f-work-opioid-epidemic-expert-says/1043205001/>.

¹⁴³ Collen L. Barry and Haiden A. Huskamp, "Moving Beyond Parity – Mental Health and Addiction Care Under the ACA," *The New England Journal of Medicine* 365 (September 15, 2011): 973, <http://www.nejm.org/doi/full/10.1056/NEJMp1108649>.

¹⁴⁴ Vivek H. Murthy, "Ending the Opioid Epidemic – A Call to Action," *The New England Journal of Medicine* 375 (December 22, 2016), <http://www.nejm.org/doi/full/10.1056/NEJMp1612578>.

unemployed persons, many of whom were addicts.¹⁴⁵ This provision was mostly due to partisan wrangling on the part of the Republicans, who generally did not support this type of reform or Obama's democratic ideology. Nevertheless, this act was still a monumental feat in the recognition that addiction should be considered a disease, and subsequently was the first stride in bringing addiction services into the mainstream health care system.

Perhaps the most important legacy of the Obama administration was the successful implementation of the Affordable Care Act in 2010. The act "represents the U.S. healthcare system's most significant regulatory overhaul and expansion of coverage since the passage of Medicaid and Medicare in the 1960s."¹⁴⁶ In terms of the opioid crisis, there are a few key provisions that have improved the American health care system's access and system fragmentation issues, which have negatively affected people suffering from addiction and other substance use disorders in the past. First off, the expansion of Medicaid coverage provided 9.5 million previously uninsured people with health insurance.¹⁴⁷ Of these 9.5 million people, it is estimated that 20-30% (around 2 or 3 million) are afflicted with some form of addiction or substance abuse disorder.¹⁴⁸ The new availability of coverage itself to millions of Americans plagued with addiction, most prominently opioid addiction, has clearly had a positive impact on the amount of people now able to seek treatment.¹⁴⁹

Another key provision of the ACA goes beyond the requirements of the Mental Health Parity and Addiction Equity Act by mandating that both Medicaid benchmark plans and plans

¹⁴⁵ Yuhua Bao and Roland Sturm, "The Effects of State Mental Health Parity Legislation on Perceived Quality of Insurance Coverage, Perceived Access to Care, and Use of Mental Health Specialty Care," *Health Services Research* 39, no. 5 (October 2004), <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC1361074/>.

¹⁴⁶ 42 U.S.C. § 1001 (2010).

¹⁴⁷ Noam N. Levey, "Obamacare Has Led to Health Coverage for Millions More People," *The Los Angeles Times*, March 30, 2014, <http://articles.latimes.com/2014/mar/30/nation/la-na-obamacare-uninsured-national-20140331>.

¹⁴⁸ *Ibid.*

¹⁴⁹ Levey, "Obamacare Has Led to Health Coverage for Millions More People."

that operate through the state-based insurance exchanges both cover behavioral health services as part of an “essential benefits package.”¹⁵⁰ In other words, the ACA expanded the number of addicted people who can receive essential treatment, such as Medication-Assisted Treatment (MAT), and other treatment services through either private or public insurance.¹⁵¹ This was an extremely important change in policy because it officially deemed addiction treatment an “essential health benefit”. As addiction specialist Dr. Anna Lembke bluntly contends, this has done more to enforce parity reimbursement than anything before or since, because “if you don’t pay doctors to treat addiction, they won’t.”¹⁵² As an extension of the concept introduced in the Mental Health Parity and Addiction Equity Act, this ACA provision expanded access for people with substance abuse disorders both within the specialty addiction sector and general medical care.

Lastly, not only did the ACA start to cover more people struggling with addiction, but it also provided states that took the Medicaid expansion with enhanced federal funding. Put simply, this funding gave states the additional resources they needed to cover adults suffering from addiction who were still excluded from the health care system. The importance of the state expansion is highly significant because Medicaid now covers nearly four in ten adults that struggle with an opioid addiction.¹⁵³ The states that have taken the expansion cover at least one in three medications that can help with opioid addiction (methadone, buprenorphine, and naltrexone), and also cover a wide range of treatment services including detox, partial hospitalization, intensive outpatient care, and case management.¹⁵⁴ Furthermore, in the thirty-

¹⁵⁰ Barry and Huskamp, 973.

¹⁵¹ Nora Volkow et al. “Medication-Assisted Therapies – Tackling the Opioid-Overdose Epidemic,” *New England Journal of Medicine* 370 (May 2014), <http://www.nejm.org/doi/full/10.1056/NEJMp1402780>.

¹⁵² Mitchell, “Obama gets a D-Minus, Trump an F.”

¹⁵³ “Medicaid’s Role in Addressing the Opioid Epidemic,” Kaiser Family Foundation, February 27, 2018, <https://www.kff.org/infographic/medicaids-role-in-addressing-opioid-epidemic/>.

¹⁵⁴ “Medicaid’s Role in Addressing the Opioid Epidemic.”

three Medicaid expansion states, uninsured hospitalizations related to behavioral health have substantially decreased.¹⁵⁵ Consequently, not only are these programs providing coverage for addicts, but they are also likely saving the federal and state governments money in the long run because of the reduction in uninsured hospital visits, which are extremely costly. Moreover, several studies indicate that treatment spending saves money in the long run, with every \$1 spent on treatment saving as much as \$7 in social costs.¹⁵⁶ These states now have new resources that are necessary for treating people addicted to opioids, and have clearly already seen the positive effects of these policies, in terms of both treatment accessibility for those who need it and economically.

In addition to the progress made under the ACA, the Comprehensive Addiction and Recovery Act of July 2016 (CARA), was explicitly designed to expand treatment programs and develop alternatives to opioid painkillers, supported by a budget of more than \$180 million annually to address the crisis. More specifically, the act authorized the National Institute of Health (NIH) to accelerate research on developing non-opioid painkillers, awarded additional grants to states for addiction treatments such as MAT, allows nurse practitioners and physician assistants to prescribe buprenorphine, and symbolically recognizes that recovery is a long-term process and that addicts suffer from a disease.¹⁵⁷

CARA was the first major piece of addiction legislation in decades and the first policy initiative by the Obama administration that directly addressed the opioid epidemic. However, many addiction specialists and drug policy scholars agree that it can be summarized as “something that appears real on the surface but has no substance,” as it did not include a direct

¹⁵⁵ Ibid.

¹⁵⁶ Tim Dickinson, “Why America Can’t Quit the Drug War,” *Rolling Stone*, May 5, 2016, <https://www.rollingstone.com/politics/news/why-america-cant-quit-the-drug-war-20160505>.

¹⁵⁷ 524 U.S.C. § 101 (2016).

funding appropriation, and merely authorized the spending increase as a suggestion for Congress, which it has yet to institute.¹⁵⁸ Moreover, it leaves some of the most effective programs for curbing the epidemic, such as oversight and mandatory prescribing practices, as voluntary. It is also unlikely that \$180 million a year would be adequate to help combat the crisis, considering most lawmakers estimate that \$920 million would be a more accurate figure.¹⁵⁹ Additionally, CARA was signed in 2016, and by that point in time the prescription opioid epidemic had already given way to the more immediate threat of fentanyl-infused heroin. Therefore, it is likely that developing non-opioid painkillers would not really have a visible impact. Again, the loopholes in this legislation can be attributed to partisan wrangling.

Later that year, the 21st Century Cures Act was passed, which authorized \$6.3 billion in funding over two years, mostly for the NIH, and awarded more than \$1 billion in new funding in grants to states for opioid-related efforts.¹⁶⁰ As it officially awarded the funds laid out in CARA, this act is seen as the capstone of the Obama administration's efforts to increase the federal drug treatment budget. Although it is a monumental feat to pass two consecutive years of funding, it is important to note that opioid addiction is a chronic condition that usually lasts much longer than two years for most of those afflicted with it, and many need long-term, ongoing treatment. Considering the current administration's stance and the Republican-held Congress, it is unlikely that this funding had a dramatic effect at all, and it seems as though it was more of a Band-Aid or quick fix than a long-term, sustainable effort to curb opioid addiction.

Obama's change in rhetoric regarding addiction and his successful restructuring of the health care system have clearly had a substantial effect on addicts. Throughout his two terms,

¹⁵⁸ Katel, "Opioid Crisis: Can Recent Reforms Curb the Epidemic?"

¹⁵⁹ Ibid.

¹⁶⁰ 34 U.S.C. § 103 (2016).

President Obama dramatically increased public health spending for anti-drug efforts and proposed the first drug control budget since President Carter that would spend more funding on treatment and prevention than law enforcement and interdiction programs.¹⁶¹ Additionally, between 2008 and 2016, the federal government's demand-reduction budget grew from \$9.1 billion to \$15.1 billion, and overall the drug treatment budget nearly doubled from \$7.2 billion to \$14.2 billion.¹⁶² Furthermore, in a more symbolic action, Obama appointed a new drug czar in 2016, Michael Botticelli, the first person to hold the position that came from the treatment side of drug policy as opposed to law enforcement in the Office of National Drug Control Policy's history. However, it is also important to note that this increase in demand-reduction spending has not come at the expense of draconian supply-side policies, which have continued to hold steady throughout Obama's administration and remain today. Overall, the Obama administration improved coverage and treatment options for those suffering from addiction and approved some funding and resources to individual states combatting the epidemic on their own.

Trump Administration

The opioid epidemic and drug policy in general have both been two of President Trump's main policy goals since the start of his campaign. Unlike his predecessor, Trump has reverted back to the War on Drugs era rhetoric. He ran on a "tough on crime" platform, a strategy which has been adopted by his top officials, including Attorney General Jeff Sessions, who has promised a swift return to a "law and order" form of criminal justice policy, as he believes that "being soft on sentencing means more violent crime."¹⁶³ This type of policy approach is

¹⁶¹ German Lopez, "How Obama Quietly Reshaped America's War on Drugs," *Vox*, January 19, 2017, <https://www.vox.com/identities/2016/12/19/13903532/obama-war-on-drugs-legacy>.

¹⁶² Dickinson, "Why America Can't Quit the Drug War."

¹⁶³ Jeff Sessions, "Being Soft on Sentencing Means More Violent Crime, It's Time to Get Tough Again," *The Washington Post*, June 16, 2017, https://www.washingtonpost.com/opinions/jeff-sessions-being-soft-on-sentencing-means-more-violent-crime-its-time-to-get-tough-again/2017/06/16/618ef1fe-4a19-11e7-9669-250d0b15f83b_story.html?utm_term=.c9d9b4ac9131.

disturbing not only because of the decades of evidence which shows that supply-side focused policies do *not* work, but it is particularly dangerous due to the current severity of the opioid epidemic. Furthermore, Trump's federal drug control agencies, including the DEA and ONDCP, are not coordinated with his goals, with one former House member calling the opioid commission "and the administration's other efforts to address the epidemic tantamount to reshuffling chairs on the Titanic."¹⁶⁴ At a time when the opioid epidemic is at its most critical point, the Trump administration is promoting a policy approach that is *known* to be ineffective, and has shifted the policy making power away from federal drug policy agencies to the executive branch.

One of the only steps Trump has taken so far that has been viewed in a positive light was his official declaration of the opioid crisis as a public health emergency on October 26, 2017. However, while the public address did draw national attention to the epidemic, it was largely symbolic. This is due to the fact that he refused to declare it a *national* emergency, which would have freed up millions in federal funding.¹⁶⁵ In a more concrete and legitimate action, Trump signed the Interdict Act in January 2017, which will provide federal agents with additional tools for detecting fentanyl and other synthetic opioids at Mexican border.¹⁶⁶ While this act is a supply-side solution, the effective monitoring of opioids, especially fentanyl, is a necessary component of the national drug policy strategy that cannot be overlooked. In terms of demand-side policies, Trump recently signed an executive order that waives a 1960s-era policy which

¹⁶⁴ German Lopez, "A Member of Trump's Opioid Commission Calls its Work 'A Charade'," *Vox*, January 23, 2018, <https://www.vox.com/policy-and-politics/2018/1/23/16923188/trump-opioid-commission-kennedy-sham-charade>.

¹⁶⁵ Julie Hirschfeld Davis, "Trump Declared Opioid Crisis a 'Health Emergency' But Requests No Funds," *The New York Times*, October 26, 2017, <https://www.nytimes.com/2017/10/26/us/politics/trump-opioid-crisis.html>.

¹⁶⁶ "Trump Says He Will Focus on Opioid Law Enforcement, Not Treatment," *National Public Radio*, February 7, 2018, <https://www.npr.org/sections/health-shots/2018/02/07/584059938/trump-says-he-will-focus-on-opioid-law-enforcement-not-treatment>.

blocked Medicaid payments to inpatient treatment facilities with more than 16 substance-abuse beds, which should make treatment more widely available.¹⁶⁷ These policies constitute the only efforts of the administration thus far that have had any effect in combating the epidemic.

An initiative implemented by the Trump administration that has not been met with such enthusiasm was his creation of an “opioid cabinet,” which has now been tasked with leading the policy coordination with agencies such as the DEA, ONDCP, and the already established opioid commission. The cabinet is headed by Kellyanne Conway, Trump’s former campaign manager with no public health or drug policy background. Even more concerning, a report from February 2018 from *Politico* stated that Conway and her staff’s main response to the crisis plaguing the nation has been to plan a “just say no” campaign and promote the construction of a border wall with Mexico.¹⁶⁸ Conway has practically taken control of the opioids agenda, and has effectively pushed out the ONDCP, the opioid commission, and other drug policy officials by systematically excluding them from decision-making meetings.¹⁶⁹ This unprecedented concentration of policy power in this executive “cabinet” illustrates Trump’s incompetence in creating a real solution for the opioid crisis – whether it is going to be a “tough on crime one” or not – as the opioid cabinet has yet to come up with a comprehensive response of any kind.

The formation of the opioid cabinet has had severely negative effects on the Office of National Drug Control Policy (ONDCP), the federal agency that is charged with creating and controlling the budget for national drug policies. It also assists the State Department and DEA in dealing with source country interdiction, provides public health and law enforcement officials

¹⁶⁷ Lenny Bernstein, “White House Opioid Commission Calls for Wide-Ranging Changes to Anti-Drug Policies,” *The Washington Post*, November 1, 2017, https://www.washingtonpost.com/news/to-your-health/wp/2017/11/01/white-house-opioid-commission-calls-for-wide-ranging-changes-to-anti-drug-policies/?utm_term=.2a9d664ec469.

¹⁶⁸ Brianna Ehley and Sarah Karlin-Smith, “Kellyanne Conway’s ‘Opioid Cabinet’ Sidelines Drug Czar’s Experts,” *Politico*, February 6, 2018, <https://www.politico.com/story/2018/02/06/kellyanne-conway-opioid-drug-czar-325457>

¹⁶⁹ Ehley and Karlin-Smith, “Kellyanne Conway’s ‘Opioid Cabinet’ Sidelines Drug Czar’s Experts.”

with grants and training, and produces the National Drug Control Strategy, an annual blueprint for drug policy.¹⁷⁰ The ONDCP director, known as the “drug czar,” is supposed to act as the president’s main advisor on issues relating to illicit drugs, ranging from manufacturing, smuggling, and addiction.¹⁷¹ In essence, the ONDCP has historically been the lead policy advising agency for the federal government in terms of drug strategy.

Not only has Trump essentially replaced the ONDCP with his opioid cabinet, but he has yet to appoint a drug czar. His original nominee, Representative Tom Marino, withdrew his name in October after reports linked his support to a bill that would have limited the DEA’s ability to investigate abuses by opioid manufacturers and distributors.¹⁷² Since then, he has failed put forth another candidate, which many view as a tactic to keep the ONCDP out of the drug policy process. As of now, the United States main drug policy office is being led by a 24-year old Trump campaign worker, Taylor Weyeneth. Weyeneth has no previous experience in drug policy, and his ascent from a low-level post to deputy chief of staff is in large part due to staff turnover vacancies.¹⁷³ His quick rise provides insight into the administration’s incompetence and the troubled future state of the ONDCP.

Similar to the ONDCP’s current position, the opioid commission’s recommendations have also been sidelined by the Trump administration and its opioid cabinet. The opioid commission was created by an executive order, and was supposed to advise Trump on ways to effectively combat the epidemic.¹⁷⁴ In its October 2017 final report, it called for expanding the

¹⁷⁰ Bernstein, “White House Opioid Commission Calls for Wide-Ranging Changes to Anti-Drug Policies.”

¹⁷¹ Ibid.

¹⁷² Ibid.

¹⁷³ Robert O’Harrow Jr., “Meet the 24-Year-Old Trump Campaign Worker Appointed to Help Lead the Government’s Drug Policy Office,” *The Washington Post*, January 14, 2018, https://www.washingtonpost.com/investigations/meet-the-24-year-old-trump-campaign-worker-appointed-to-help-lead-the-governments-drug-policy-office/2018/01/13/abdada34-f64e-11e7-91af-31ac729add94_story.html?utm_term=.3807cd7b02df.

¹⁷⁴ Chris Christie et al., “The President’s Commission on Combating Drug Addiction and the Opioid Crisis,” The White House, October 2017, https://www.whitehouse.gov/sites/whitehouse.gov/files/images/Final_Report_

capacity for drug treatment under Medicaid, increasing the use of MATs, mandating that every local law enforcement officer carry naloxone, creating more drug courts, creating block grants of substance abuse aid for cities and states, and mandating providers to check PDMPs.¹⁷⁵ Notably absent from this report, of course, are the supply-side based, tough-on-crime measures that Trump and Sessions have offered up as solutions, such as building “the wall” and expanding the use of mandatory minimums for low-level drug crimes. The commission was disbanded in December 2017, and virtually none of its recommendations, written by some of the leading drug policy and addiction treatment specialists in the nation, have yet to be taken into consideration. Again, one can see the disconnect between the rhetoric and policies put forth between the Trump administration and the federal drug agencies and commissions.

In contrast with the policies Trump is trying to *avoid*, there are two significant initiatives he is pushing to implement that will affect the opioid epidemic, albeit in a negative way. These two policies include repealing the ACA, and instituting budget cuts to demand-side policies and increased budget spending for supply-side policies. Trump ran his campaign on the promise of an ACA repeal, and although it was not necessarily designed with the opioid epidemic in mind, it has provided millions of addicts with expanded access to medical treatment, health insurance coverage, and addiction treatment. It is now estimated that over 660,000 Americans who suffer from opioid use disorders are now covered under the ACA Medicaid expansion.¹⁷⁶ Therefore, if the ACA is repealed, these people will automatically lose coverage for all of these essential health benefits, and many of these lifesaving treatments will be out of reach yet again. Small,

Draft_11-1-2017.pdf.

¹⁷⁵ Ibid.

¹⁷⁶ Peter D. Friedmann, Christina M. Andrews, and Keith Humphreys, “How ACA Repeal Would Worsen the Opioid Epidemic,” *The New England Journal of Medicine* 376, no. 16 (March 9, 2017), <http://www.nejm.org/doi/full/10.1056/NEJMp1700834>.

mostly white, rural communities throughout the Midwest, many of which have been hit the hardest the epidemic, will also be affected to the greatest extent by such a repeal. For example, in West Virginia, one of the most devastated states, nearly half of the funding the state uses to combat the crisis comes from Medicaid.¹⁷⁷ Moreover, in 2015, the fifteen counties with the highest mortality from opioid-related overdoses were all located in Kentucky and West Virginia, both of which took the Medicaid expansion.¹⁷⁸ Although the first attempt to repeal the ACA was not successful, there will likely be future attempts by the administration, which would immediately revoke coverage for over half a million addicts struggling with an opioid addiction.

Lastly, the outline of Trump's 2019 fiscal year budget embodies the administration's draconian, punitive, and "law and order" based approach to drug policy that is alarmingly reminiscent of the War on Drugs era in the late 1980s and early 1990s. An outline of the proposals released from the White House Office of Management and Budget shows that the president intends to give \$10 billion in 2019 to the U.S. Department of Health and Human Services for demand-side policies, such as treatment, recovery, mental health, and prevention programs for opioid users.¹⁷⁹ While this seems like a substantial amount, it is quite small compared to the combined \$44 billion he plans to use on infrastructure spending for his wall and border security priorities.¹⁸⁰ Again, one can see how the American government has yet to grapple with the origins and lasting systems put in place by the drug war, and the Trump administration is only continuing to proliferate its failed supply-side policies.

¹⁷⁷ Mitchell, "Obama Gets a D-Minus, Trump an F for Work on Opioid Epidemic, Expert Says."

¹⁷⁸ Friedmann, Andrews, Humphreys, "How ACA Repeal Would Worsen the Opioid Epidemic."

¹⁷⁹ United States White House, Office of Management and Budget, *The President's Budget*, The White House, N.d., <https://www.whitehouse.gov/omb/budget/>.

¹⁸⁰ Ibid.

Drug policy has historically been a federal policy domain. However, the stalemate, incompetency, and outright incorrect policy direction of the current administration demonstrates why states and localities might be the best levels of government for combating the opioid epidemic in terms of demand-side solutions. President Trump's response to the 115 Americans dying every day from an opioid-related overdose is to simply teach kids that "there is nothing desirable about drugs. They're bad. Maybe talking to youth and telling them [drugs] are no good, really bad for you, in every way" will work. Given the lack of a detailed plan, it seems basically implausible that a coherent, comprehensive drug policy will be put in place any time soon.¹⁸¹ Considering this type of rhetoric, it is important going forward to note that the state and local levels, whose public health officials, law enforcement officers, and community groups are confronted directly with the crisis every day, have embraced the effectiveness of using both supply-side and demand-side policies to effectively counteract this ongoing epidemic.

¹⁸¹ Dan Merica, "Trump to Declare National Emergency on Opioids Months After Initial Promise," *CNN*, October 16, 2017, <https://www.cnn.com/2017/10/16/politics/donald-trump-opioids-national-emergency/index.html>.

Chapter IV: State and Local Supply-Side and Demand-Side Policies

“Some people might argue that the widespread distribution of a safe, effective, and inexpensive antidote might actually encourage drug use. But that’s like suggesting that air bags and seatbelts encourage unsafe driving” – Robert S. Hoffman, Emergency Physician

I. Introduction

Unlike the responses, or lack thereof, at the federal level, state and local governments have begun to enact their own comprehensive and appropriate strategies to combat the opioid epidemic. The War on Drugs’ supply-side policies had many long-lasting, detrimental consequences, such as the militarization of state and local police, mass incarceration, and a considerable fiscal impact on the federal government.¹⁸² However, as mentioned throughout this thesis, diminishing the supply of any type of drug is still an important piece of the supply and demand puzzle, albeit not the only one. On the other hand, the demographics of the population now most severely affected by the epidemic, the “scourge of white, working-class Americans from the Midwest to New England,” is changing the perception of how an epidemic of addiction should be addressed.¹⁸³ Recently, states and localities have taken a more active role in implementing demand-side policies, in particular treatment, rehabilitation, and prevention.¹⁸⁴ Yet, in the same way that strictly supply-side policies are inadequate on their own, so are demand-side policies. While reducing the “demand” for drugs (the addicted users), is of course the primary goal in combatting any addiction epidemic, due to the cheap availability and wide accessibility of heroin and other synthetic opioids, sufficient supply-side policies must also be employed. In that light, the purpose of this chapter is to evaluate several supply-side and

¹⁸² Refer back to Chapter 1, page 19.

¹⁸³ “Inside the Opioid Epidemic: Deaths from the Drugs Say More About Markets than About White Despair,” *The Economist*, May 11, 2017, <https://www.economist.com/news/united-states/21721960-deaths-drugs-say-more-about-markets-about-white-despair-inside-opioid>.

¹⁸⁴ Stephen Barlas, “U.S. and States Ramp Up Response to Opioid Crisis,” *Pharmacy and Therapeutics Peer-Reviewed Journal* 42, no. 9 (September 2017), <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5565130/>.

demand-side policies that have been implemented on the state or local level, and provide evidence to support their efficacy, in order to draw conclusions about the most successful strategies that are currently available for combatting the opioid crisis.

II. Supply-Side Policies

The second wave of the opioid epidemic is fueled by heroin, specifically fentanyl-infused heroin, both of which are illegal and carry high social risks for users. Therefore, reducing their supplies through effective enforcement, interdiction, production control, and other criminal justice or law enforcement approaches is of the utmost importance. While the federal government and its agencies, such as the DEA and FBI, have more authority over interdiction strategies and production control, in the wake of the crisis state and local governments are beginning to take action in terms of criminal justice or other law enforcement policies. State prescribing limits for opioid painkillers have been some of the most popular supply-side policies implemented on the state level.¹⁸⁵ However, fentanyl-adulterated heroin is now the most urgent hazard to states and localities, as it no longer constitutes a “situation of isolated outbreaks, but a major sustained public health challenge.”¹⁸⁶ Consequently, they are beginning to institute several innovative and effective supply-side strategies that are worthy of mention. Although some are in line with the Trump administration’s “tough on crime” mantra and reversion back to the failed War on Drugs policies, for the most part states and localities are employing responsive and suitable supply-side solutions that have been significantly reducing the amount of illicit heroin and fentanyl available in their communities.

¹⁸⁵ Refer back to Chapter 3, page 46.

¹⁸⁶ Christine Vestal, “As Fentanyl Spreads, States Step Up Responses,” *The Pew Charitable Trusts*, May 8, 2017, <http://www.pewtrusts.org/en/research-and-analysis/blogs/stateline/2017/05/08/as-fentanyl-spreads-states-step-up-responses>.

Florida

Florida has perhaps been the most aggressive in taking a “tough on crime” approach to the opioid crisis that in many ways parallels the response on the federal level. In July of 2017, Governor Rick Scott signed House Bill 477 into law, a controlled substances act that imposed a three-year mandatory minimum for fentanyl and its derivatives. Florida’s Attorney General Pam Bondi was one of the main lobbyists behind this provision, declaring that “[the bill] is going to get these monsters off the streets for three years while we can clean this problem up throughout our country.”¹⁸⁷ Most drug policy experts are skeptical about the institution of a mandatory minimum sentence for fentanyl trafficking. Historically, laws that set “mandatory prison time for arbitrary possession amounts have been shown to capture both addicts and poor minorities in cycles of imprisonment and poverty... have done little to decrease usage levels... and have not deterred drug trafficking at all.”¹⁸⁸ Addressing the new threat of fentanyl within the criminal justice system is of paramount importance, but imposing mandatory minimums in an already extremely punitive state system might not prove to be the most viable option.

Part of the reason that Florida is one of the few states enacting this type of draconian approach to drug policy is due to the structure of its state legislature. Florida is one of fifteen states where lawmakers have term limits, which “philosophically fits the state’s conservative aversion to lifelong politicians, but practically it means lawmakers have less institutional knowledge and often leave before they see the effects of their actions.”¹⁸⁹ The consequences of these limits are reflected in the fact that throughout the past few decades, Florida’s criminal

¹⁸⁷ Nick Evans, “FL Takes Hard Line on Opioids But Some Question Approach,” *Health News Florida*, July 14, 2017, <http://health.wusf.usf.edu/post/fl-takes-hard-line-opioids-some-question-approach#stream/0>.

¹⁸⁸ Nick Fouriezos, “As Other States De-Escalate, Florida Declares War on Drugs,” *Ozy*, May 19, 2017, <https://www.ozy.com/politics-and-power/as-other-states-de-escalate-florida-declares-war-on-drugs/77358>.

¹⁸⁹ *Ibid.*

justice system has increasingly become one of the most punitive systems in the country. By 2010, it's incarceration rate was 38% higher than the national average, and by 2012, almost half of the 32,555 inmates were repeat offenders, many of whom were arrested for drug crimes.¹⁹⁰ These statistics highlight the popular opinion that punitive policies, such as mandatory minimums, do not discourage people from committing crimes or lower recidivism rates. Moreover, there were 5,725 opioid-related deaths in Florida in 2016, a 35% increase from 2015.¹⁹¹ Again, one can see that harsh punishments for drug crimes have not had a sizeable effect on the availability or price of opioids, as the overdose rates continue to rise. Lastly, a study commissioned by the state found that Florida's prison system provided core treatment to a mere 14% of inmates, many of whom struggle with addiction.¹⁹² Florida compares poorly to other states in terms of mental health and substance abuse funding per capita, which can be mostly attributed to this heavy focus on incarceration. For example, Florida's 2017 fiscal budget included an \$11 million reduction in mental health and substance abuse funding.¹⁹³ Not only has this "tough on crime" approach failed on both the federal and state levels to reduce the supply of opioids to any degree, but it has also had negative consequences for the addicts who get caught up in the system. Therefore, mandatory minimums and other particularly draconian drug war era policies should not be taken into serious consideration when it comes to altering drug policy in the face of the opioid epidemic.

¹⁹⁰ Bob Butterworth and Simone Marsteller, "Florida in Dire Need of Criminal Justice Reform," *The Sun Sentinel*, March 10, 2018, <http://www.sun-sentinel.com/opinion/commentary/fl-viewpoint-reform-20160310-story.html>.

¹⁹¹ Florida Department of Law Enforcement, *Drugs Identified in Deceased Persons by Florida Medical Examiners 2016 Annual Report*, Florida Department of Law Enforcement, November 2016, <https://www.fdle.state.fl.us/MEC/Publications-and-Forms/Documents/Drugs-in-Deceased-Persons/2016-Annual-Drug-Report.aspx>.

¹⁹² Butterworth and Marsteller, "Florida in Dire Need of Criminal Justice Reform."

¹⁹³ Florida Association of Counties, *2017-2018 Florida Legislature's Proposed State Budget – General Overview*, FAC: Florida Association of Counties, N.d., <http://fl-counties.com/2017-2018-florida-legislatures-proposed-state-budget-general-overview>.

Indiana

Like Florida, Indiana has also maintained a “tough on crime” approach that has been revived on the federal level by the Trump administration. Mainly, the focus has been on incarcerating drug traffickers, specifically those who sell heroin and fentanyl. In May 2017, Governor Eric Holcomb’s Drug Prevention Treatment and Enforcement Task Force released a multi-faceted “Preliminary Action Plan” to tackle the crisis via treatment, strategic law enforcement, and “community-based collaborations.”¹⁹⁴ Even so, a tension remains between the Governor’s office and the state’s prosecutors, who are for the most part vehemently opposed to any medical approach to treatment, such as Medication-Assisted Treatment (MAT). In general, prosecutors, and district attorneys in particular, are opposed to criminal justice reform because it diminishes some of their authority over determining what sentences will be imposed on those convicted of drug crimes. The president of the Association of Indiana’s Prosecuting Attorneys (AIPA), Patricia Baldwin, recently argued that “penalties for drug possession and drug dealing are too low,” and that the task force’s comprehensive plan does not provide “a comparable and equivalent improvement on the enforcement side.”¹⁹⁵ The power struggle between the Governor and the state prosecutors is a familiar story that began in the drug war era, as prosecutors are usually one of the driving forces behind the implementation of destructive punitive policies, such as mandatory minimums.

This conflict can also be seen between Indiana’s state legislature and its prosecutors. In 2013, the state legislature passed House Bill 1006, which “decrease[d], from a felony to a misdemeanor, possession of a scheduled controlled substance.”¹⁹⁶ One of the primary objectives

¹⁹⁴ Carimah Townes, “Indiana prosecutors want to incarcerate the opioid crisis away,” *In Justice Today*, August 15, 2017, <https://injusticetoday.com/indiana-prosecutors-want-to-incarcerate-the-opioid-crisis-away-62ec0399a3>.

¹⁹⁵ *Ibid.*

¹⁹⁶ “Emerging Drug Threats,” NCSL, June 6, 2017, <http://www.ncsl.org/research/civil-and-criminal-justice/synthetic>

behind this type of reform was to reduce the number of people convicted of low-level, nonviolent drug crimes in state prisons for both fiscal and ethical reasons. Another goal was to subsequently secure treatment options for the low and medium-level offenders. Thus, the successful passage of this bill was seen as a necessary initial action in redacting some of the punitive policies for low-level drug crimes instituted in the drug war era that have negatively affected many addicts.

In May 2017, Baldwin released another statement that called for a more drastic law enforcement approach to solving the opioid epidemic, and “slammed [the] legislator’s decision to reform Indiana’s criminal code.”¹⁹⁷ Additionally, she contended that the changes “curb [prosecutors and law enforcement’s] ability to address rampant opioid use and believe the task force’s proposal is doomed to fail without their help.”¹⁹⁸ Indiana’s draconian, law enforcement-based policies that were instituted in the War on Drugs era persist today, despite efforts by the Governor and state legislature to correct them.

Maine

Alongside Florida and Indiana, Maine has also attempted to toughen its penalties for drug traffickers. However, instead of relying on the older mandatory minimum framework or essentially deferring to state prosecutors to implement policy, the state legislature has developed new laws that specifically address the threat of fentanyl. Because fentanyl is extremely potent, even small amounts equivalent to a few grains of salt can prove deadly. Additionally, compared to more traditional methods of opioid administration, such as intravenous use, it can be easily inhaled or absorbed through the skin. This poses an extreme risk not only for the users, but to the

-drug-threats.aspx.

¹⁹⁷ Patricia Baldwin, “Prosecutors and Health Care Workers Need Tools to Fight Opiate Epidemic,” *The Batesville Herald-Tribune*, August 13, 2017, http://www.batesvilleheraldtribune.com/opinion/prosecutors-and-health-care-workers-need-tools-to-fight-opiate/article_b2ac6cfc-c0e5-5a27-9fb3-94f9bba21177.html.

¹⁹⁸ *Ibid.*

bystanders, first responders, law enforcement officials, and medical professionals who are often present during overdoses.¹⁹⁹ Consequently, Maine’s state legislature passed 17-A MRSA § 1101 in 2017, which:

Makes it a trafficking offense to possess 2 or more grams of fentanyl powder or 90 or more individual bags, folds, packages, envelopes, or containers of any kind containing fentanyl powder. Makes it an offense to “furnish” controlled substances by possession of 2 grams or more of fentanyl powder or at least 45, but fewer than 90 individual bags, folds, packages, envelopes, or containers of any kind containing fentanyl powder. Defines "fentanyl powder" as any compound, mixture or preparation, in granular or powder form, containing fentanyl.²⁰⁰

While it is too early to study the effects of this legislation, it is important to note because it represents a new type of legislation that is designed specifically to address the trafficking of fentanyl. Unlike cocaine or even heroin itself, fentanyl’s high level of potency means that miniscule amounts have the capacity to cause extremely high rates of overdoses and overdose fatalities. Consider this: a mere 2 milligrams of fentanyl are enough to cause an overdose fatality.²⁰¹ An envelope, a common vessel for trafficking, can hold around 2 grams of fentanyl.²⁰² This means that *one* envelope of fentanyl has the potential to kill over *1,000* people. Therefore, laws that take fentanyl’s unique properties and dangers into account will most likely prove more effective in deterring the trafficking of the drug than a one-size-fits-all mandatory minimum.

California

More than any other state, California has taken the most active role in instituting criminal justice reforms that are in direct contrast with the “tough on crime” response on the federal and

¹⁹⁹ “Emerging Drug Threats.”

²⁰⁰ 17-A MRSA § 1101 (2017).

²⁰¹ United States Department of Justice, Drug Enforcement Administration, *Counterfeit Prescription Pills Containing Fentanyls: A Global Threat*, Drug Enforcement Administration, July 2016, <https://www.dea.gov/docs/Counterfeit%20Prescription%20Pills.pdf>

²⁰² Lauren Villa, “Is Fentanyl More Deadly Than Heroin,” Drug Abuse, N.d., <https://drugabuse.com/library/is-fentanyl-more-deadly-than-heroin/>.

some state levels. California is one of the most populous states that incorporated drug war policies into its own state system, and now boasts the second highest prison population in the country, totaling 129,536 prisoners as of March 2018.²⁰³ The correlation between War on Drugs policies and high prison rates began to be noticed by the mid-2000s, which subsequently led to drastic criminal justice reforms in California. Interestingly, many of these changes have been introduced as propositions, as opposed to bills put forth by the state legislature. Propositions are referendums or initiative measures that are submitted to the electorate for a direct decision or direct vote either by the state legislature, or more commonly, via a petition signed by registered voters.²⁰⁴

In terms actual reform, California Proposition 36, passed in 2012, “remove[d] the mandatory life sentence for a nonviolent, non-serious offense under the three strikes law.”²⁰⁵ Moreover, California Proposition 47, passed in 2014, “reduce[d] drug possession from a felony to a misdemeanor.”²⁰⁶ Due to their novelty, peer-reviewed studies have yet to be published about the efficacy of these propositions in diverting opioid addicts away from the penal system and into detoxification or rehabilitation programs. However, both of these reforms have probably diminished the likelihood that addicts would be arrested for possession or receive a lifelong mandatory sentence. Not only should these types of policies be taken into consideration by other states in dire need of criminal justice reform, but the proposition process itself also has advantages. Although California employs propositions more than other states, the utilization of

²⁰³California Department of Corrections and Rehabilitation: Division of Internal Oversight and Research, Office of Research, *Weekly Report of Population as of Midnight March 21, 2018*, May 21, 2018, https://www.cdcr.ca.gov/herReports_Research/Offender_Information_Services_Branch/WeeklyWed/TPOP1A/TPOP1Ad180321.pdf.

²⁰⁴ Timm Herdt, “After 100 years, Does California’s Initiative Process Need a Tune-Up,” *Ventura County Star*, September 24, 2011, <http://archive.vcstar.com/news/after-100-years-does-californias-initiative-process-need-a-tune-up-ep-364421038-352291341.html/>.

²⁰⁵ California Proposition 36 (2012).

²⁰⁶ California Proposition 47 (2014).

citizen action and mobilization to implement successful supply-side solutions should not be overlooked when contemplating how these types of policies can be instituted, especially in polarized state governments.

Boone, Campbell, and Kenton Counties, Kentucky

While the state level provides a useful channel to enact practical supply-side solutions, the strategies implemented on the local, city, and county levels should not be underestimated in terms of their creativity and effectiveness. The concept of regional cooperation is “perhaps the most important in law enforcement, given that drug trafficking often cuts across local lines, whether [it be] through formal task forces or less formal regular meetings.”²⁰⁷ An example of a successful regional formal task force is the Northern Kentucky Drug Strike Force. This Strike Force was founded through an inter-local agreement between Boone, Campbell, and Kenton counties in an attempt to pool their resources and foster cooperation between their police agencies and community groups.²⁰⁸ The agency is “charged with the responsibility of investigating, apprehending, and prosecuting those involved in the illicit use and distribution of controlled substances, as well as, disrupting and/or dismantling drug trafficking organizations.”²⁰⁹ The Strike Force achieves these goals through undercover surveillance, undercover police buys, and in-depth, cooperative investigations based on intelligence gained from all three of the counties.²¹⁰ Since the 1980s, the agency has continued to expand, acquire data and information from each of the counties, and provide efficient drug enforcement.

²⁰⁷ National Association of Counties and the National League of Cities, *A Prescription for Action: Local Leadership in Ending the Opioid Crisis*, Opioid Action, N.d., <http://opioidaction.org/report/>.

²⁰⁸ Northern Kentucky Drug Strike Force, N.d., <http://nkdsf.org/index.php/about-nkdsf/history-2/>.

²⁰⁹ Ibid.

²¹⁰ Ibid.

The Strike Force offers both undercover narcotics and on-site training. The undercover narcotics training consists of “on the job training,” where the police officers learn about the most important aspects of undercover drug operations, including surveillance (both physical and electronic), controlled buy planning and execution, and search warrant application, planning, and execution.²¹¹ The on-site training is provided for agencies that request guidance in a specific area of narcotics investigation, and mainly includes training on methamphetamine and heroin labs, and teaches common methods of drug abuse, packing, and trafficking.²¹² While there are other similar formal task forces around the country, the Northern Kentucky Drug Strike Force is particularly noteworthy due to the newly implemented state legislation that focuses on the supply reduction and enforcement of heroin and fentanyl. Like Maine’s new laws, mandatory minimums are not included, and most of the legislation specifically targets fentanyl trafficking. For example, the Kentucky state legislature passed KRS § 218A 1412 in June 2017, which:

Prohibits trafficking of fentanyl. Provides that a person is guilty of trafficking in a controlled substance in the first degree when he or she knowingly and unlawfully traffics any quantity of heroin, fentanyl, carfentanil, or fentanyl derivatives. A first offense is a class C felony and a second offense is a class B felony. Requires an offer to serve at least 50% of their sentence.²¹³

This act is a significant policy because it clearly defines that the trafficking of heroin, fentanyl, and its synthetic derivatives as a serious drug crime that, at least for the duration of the opioid epidemic, is going to be treated *differently* than other drug crimes. Another important bill that was passed around the same time was KRS § 218A 142, which:

Prohibits trafficking in a misrepresented controlled substance. Provides that a person is guilty of trafficking in a misrepresented controlled substance when he or she knowingly and unlawfully sells or distributes fentanyl, carfentanil, or any Schedule I substance while misrepresenting the identity of the drug being sold or distributed as a legitimate pharmaceutical product,

²¹¹ Northern Kentucky Drug Strike Force.

²¹² Ibid.

²¹³ KRS § 218A 1412 (2017).

which is a Class D felony.²¹⁴

This act is also important not only because fentanyl has become infused into heroin supplies, but it has also started to appear in counterfeit opioid painkillers that are sold on the street. Before this act was passed, a state law that explicitly addressed this issue did not exist. Again, while it is too early to provide any concrete evidence about the efficacy of these laws, it is extremely likely that by clarifying how charges related to heroin, fentanyl, and their derivatives should be charged, drug task forces like the Strike Force can operate more effectively.

High Point County, North Carolina

Another pioneering supply-side solution for the opioid epidemic that has been implemented on the county level is the Drug Market Intervention (DMI) strategy. DMI was started in High Point County, North Carolina in 2004, and has since spread to dozens of other cities and counties all over the country. Overt drug markets, which are drug markets that operate openly in public, obviously create dangerous and violent risks for communities. Instead of focusing solely on the legislation that dictates drug crimes, this program targets overt drug markets by engaging directly in communities to identify street-level dealers, arrest violent offenders, and develop prosecutable drug cases for nonviolent dealers (but suspends these unless the dealer continues dealing), which allows law enforcement to put dealers on notice that any future dealing will result in certain, immediate sanctions.²¹⁵ Unlike many supply-side, criminal justice solutions or reforms, DMI not only brings together legislators and law enforcement officials, but also those committing the crimes – the dealers themselves. It even provides sit-down meetings between the dealers, their families, police officers, social service providers, and

²¹⁴ KRS § 218A 142 (2017).

²¹⁵ “Drug Market Intervention,” National Network for Safe Communities at John Jay College, N.d. <https://nnscommunities.org/our-work/strategy/drug-market-intervention>.

community leaders to make clear that the drug sales must end.²¹⁶ That partnership “tells dealers clearly and directly that the community cares about them but rejects their behavior, that help is available, and that continued dealing will result in immediate consequences through the activation of existing cases.”²¹⁷ By taking a community approach to drug market intervention, this strategy is unlike others in the fact that it brings together *everyone* involved in drug crime in order to curb the supply of drugs.

The foundational principle at the core of DMI is the deterrence theory, which holds that humans are rational beings who consider the consequences of their actions, and are deterred from engaging in continual patterns of offending as a result of the certainty, severity, and celerity of punishment.²¹⁸ Because DMI enables law enforcement officials to come in direct contact with street-level drug dealers, and dissuade them away from dealing by offering a suspension on their sentences, they are often successful in deterring drug dealing. A study by the National Network for Safe Communities at John Jay College found that DMI reduced the amount of drug offenses in Nashville by 55%, in High Point by 44-56%, and the amount of non-violent offenses in Rockford by 22%.²¹⁹ While this strategy has proven successful in diminishing the influence of *overt* drug markets in certain communities, the opioid epidemic provides a unique challenge because, in general, opioids are sold through *covert* markets, as “people are not standing out on street corners selling opioids or operating flagrant drug houses.”²²⁰ However, a study of the DMI strategy in Rutland, Vermont demonstrated that officials were still able to identify dealers and

²¹⁶ Ibid.

²¹⁷ “Drug Market Intervention.”

²¹⁸ Nick Corsaro, Eleazer D. Hunt, Natalie Kroovand Hipple and Edmund F. McGarrell, “The Impact of Drug Market Pulling Levers Policing on Neighborhood Violence,” *Criminology & Public Policy* 11, no. 2 (May 2, 2012), <https://onlinelibrary.wiley.com/doi/abs/10.1111/j.1745-9133.2012.00798.x>.

²¹⁹ “Drug Market Intervention.”

²²⁰ David Kennedy and Jonathon Ben-Menachem, “Rutland, Vermont, Case Study: Using DMI to Combat Covert Opioid Markets,” *Police Chief Magazine*, March 2018, <http://www.policechiefmagazine.org/rutland-vermont-case-study/?ref=ee82da1da915d3c6f32f7d22f4bfb5el>.

“developed an enforcement and maintenance strategy to permanently shut down each layer of participation in the market... between 20 to 25 out-of-state volume distributors and violent dealers [eventually] faced federal charges.”²²¹ Rutland’s DMI effort has not been formally evaluated yet, however, this preliminary research noted some positive effects, including a 17% reduction in overall crime in the city after the program was implemented, and a decrease in drug-related deaths between 2013 and 2015.²²² These findings suggest that DMI may hold promise as a successful supply-side policy solution that can target the covert opioid market directly.

III. Demand-Side Policies

In addition to the supply-side policies outlined above, several innovative demand-side approaches have also been implemented on the state and local levels. For the purpose of this chapter, demand-side policies refer to any harm-reduction policies, treatment, education, or prevention programs that are put in place to reduce the number of drug users.²²³ Specifically, harm-reduction policies are strategies, programs, and practices that aim to diminish the harms directly associated with the use of psychoactive drugs in people unwilling or unable to stop.²²⁴ Since 1990, there has been a “steady rise in the proportion of substance abuse treatment facility admissions for heroin abuse as compared to other illicit drugs, as addiction has been increasingly rapidly throughout the 2000s... in 1993 the proportion of all admissions reporting heroin as the

²²¹ Kennedy and Ben-Menachem, “Rutland, Vermont, Case Study: Using DMI to Combat Covert Opioid Markets.”

²²² Vermont Department of Health, *Drug-Related Fatalities in Vermont*, Vermont Department of Health, January 2018, http://www.healthvermont.gov/sites/default/files/documents/pdf/ADAP_Data_Brief_Drug_Related_Fatalities.pdf.

²²³ Refer back to Chapter 1, page 6.

²²⁴ “What is Harm Reduction? A Position Statement from Harm Reduction International,” Harm Reduction International, 2018, <https://www.hri.global/what-is-harm-reduction>.

primary drug was 20%, and by 2003 it was 39%, a 252% increase.”²²⁵ These statistics highlight why public health officials, addiction specialists, scholars, and policy makers are currently reembracing the value of demand-side solutions. Moreover, modern medical research has shifted how people think of addiction, which is now generally viewed as a chronic disease that is receptive to treatment, and “requires a long-term approach with Medication-Assisted Therapies (MAT), counseling support, and similar means to assist with psychosocial challenges.”²²⁶ In effect, states and localities are instituting comprehensive, public health approaches that aim to diminish the “demand” for opioids, by creating increased access to treatment, rehabilitation, harm-reduction, and prevention programs.

San Francisco, California

As previously mentioned, California has taken a number of measures to improve how its criminal justice system treats drug offenders. Additionally, cities throughout the state have begun to implement harm-reduction solutions that have been successful in reducing the many harms associated with opioid use, such as the transmission of deadly diseases and an increasing likelihood of an overdose fatality. San Francisco was one of the first cities to pilot one of these programs, the DOPE Project, which was founded by California’s Department of Public Health as a “Harm Reduction Coalition” in 1993.²²⁷ One of its main strategies includes a syringe access program, which provides a place where users can use drugs safely and exchange their used needles for clean ones without fear of criminal punishment. This program, the Syringe Access Collaborative (SAC), “is an essential component in the prevention of HIV and hepatitis C among

²²⁵ William Fernandez, Holly Hackman, Loreta Mckeown, Teresa Anderson, and Beth Hume, “Trends in Opioid-Related Fatal Overdoses in Massachusetts, 1990-2003,” *Journal of Substance Abuse Treatment* 31, (2006): 155, <https://www.rand.org/pubs/testimonies/CT469.html>.

²²⁶ Stephen Barlas, “U.S. and States Ramp Up Response to Opioid Crisis: Regulatory, Legislative, and Legal Tools Brought to Bear,” *Pharmacy and Therapeutics Peer-Reviewed Journal* 42, no. 9 (September 2017), <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5565130/>.

²²⁷ “About Us,” Harm Reduction Coalition, N.d., <http://harmreduction.org/about-us/>.

people who inject drugs, [as] research consistently demonstrates this effectiveness in preventing [the] transmission of infectious disease and skin and soft tissue infections, while also supporting the overall health and well-being of the drug users from linkages to drug treatment, medical care, housing, and overdose prevention.”²²⁸ Even though programs like SAC do not necessarily reduce the overall usage of opioids, they are successful in diminishing the *harms* associated with that use. From a community-based perspective, this type of initiative is starting to become more normalized due to the growing recognition that addiction is a disease, and that addicts should be protected from the risks associated with their use until they are able, or willing, to get help.

Another modern harm-reduction approach supported by the DOPE Project is the introduction of fentanyl test strips into the drug-using community. The Fentanyl Test Strip Pilot program was launched in August 2017 in response to the sudden appearance of fentanyl in San Francisco’s drug supply. It partnered with the SAC to provide strips to San Francisco’s syringe access programs throughout the city, funded by the California Department of Public Health.”²²⁹ This program was instituted a few months ago, and thus it is not possible to analyze its immediate effects yet. Nevertheless, it is an extremely important policy to consider because most heroin users are unaware that their heroin has been mixed with fentanyl, which of course carries a much higher risk of an overdose. By providing users with test strips, addicts can test the supply they buy and avoid, or at the least be aware, when the heroin has been injected with fentanyl or other highly potent synthetic opioids.

Perhaps the most important DOPE Project strategy is its distribution of intranasal naloxone. In accordance with standing medical orders, in 2010 the DOPE Project started to supply naloxone at all San Francisco needle exchange sites, methadone maintenance programs,

²²⁸ “About Us.”

²²⁹ Ibid.

and other community-based programs.²³⁰ Naloxone is an effective antidote for opioid overdoses due to its pharmacological properties. Once administered, “it promptly reverses the biological effects that are caused by heroin, reversing the respiratory suppression caused by opioids and consequently reversing the fatal opioid overdose.”²³¹ Due to the pervasiveness of fentanyl in San Francisco’s heroin supply, this is a crucial policy that should be taken into serious consideration by every locality or state severely affected by the opioid epidemic. Although part of the Obama administration’s opioid initiative was to expand access to naloxone, “there remains considerable debate amongst clinicians, policy makers, and researchers about whether providing education and naloxone kits does in fact save lives or instead discourages treatment and causes harm (by reducing interactions with emergency health care providers and/or encouraging risky behaviors).”²³² While this is a valid concern, the results of this initiative were assessed, and reports showed a continuous trend in the reduction of opioid overdose deaths from 1996 to 2010.²³³ Providing overdose information, prevention, and response education to drug users, their families, friends, communities, and first responders are necessary actions that are needed to quickly diminish the number of addicts who experience overdoses and overdose fatalities.

King County, Washington

King County’s Law Enforcement Assisted Diversion Program (LEAD), is one of the most well-known harm-reduction programs in the country. Founded in 2011, it seeks to divert addicts away from low-level drug crime punishment into treatment services. Specifically, it is a

²³⁰ Michele M Straus, Udi E Ghitza, and Betty Tai, “Preventing Deaths from Rising Opioid Overdose in the U.S. – The Promise of Naloxone Antidote in Community-Based Naloxone Take-Home Programs,” *Substance Abuse and Rehabilitation* 4 (September 2, 2013): 4-5, <https://www.ncbi.nlm.nih.gov/pubmed/24273417>.

²³¹ Straus, Ghitza, Tai, 4.

²³² *Funding Considerations in the Fight Against the Opioid Epidemic: Testimony Before the House of Appropriations Committee, Subcommittee on Labor, Health, and Human Services, Education, and Related Agencies, United States House of Representatives, 115th Cong. (2017)* (statement of Rosalie Liccardo Padula, Ph.D.), https://www.rand.org/content/dam/rand/pubs/testimonies/CT400/CT469/RAND_CT469.pdf.

²³³ Straus, Ghitza, Tai, 4.

“pre-booking diversion pilot program [that] allows law enforcement officials to redirect low-level offenders engaged in drug activity to community-based treatment and support services – including housing, health care, job training, treatment and mental health support – instead of processing them through traditional criminal justice system avenues.”²³⁴ The program is funded through a collection of private foundations, and is governed by a wide-ranging “group of stakeholders... membership of the policy coordinating group includes the mayor, county executive, city council, city attorney’s office, county prosecutor, county sheriff, municipal police, state corrections department, community groups, and advocates.”²³⁵ Not only does this coalition reduce the criminal behavior of people who participate in the program, many of whom are addicts, but it also subsequently improves the overall public safety within the community.

Studies so far have evaluated the relative effectiveness of the LEAD program in reducing criminal recidivism. In a study conducted in 2015, participants in LEAD were found to be 60% less likely than those in the control group to reoffend within the first six months of evaluation.²³⁶ In terms of the opioid epidemic, this is a substantial reduction in the number of people arrested for low-level, nonviolent drug crimes, many of whom tend to be “addict dealers” that only sell drugs in order to support their own habit. By diverting them away from jail, in which only 15% of addicted inmates receive treatment of any kind, users are placed into community-service groups and treatment programs.²³⁷ This type of program is unique, as it *requires* the coordination between public health officials, city and county representatives, law enforcement agencies, and private-sector supporters. While this wide-ranging coalition may seem unlikely to form in other

²³⁴ “Home Page,” LEAD: Law Enforcement Assisted Diversion, N.d., <http://leadkingcounty.org>.

²³⁵ Kelly Murphy et al., “Finding Solutions to the Prescription Opioid and Heroin Crisis: A Road Map for States,” National Governors Association, July 2016, https://www.nga.org/files/live/sites/NGA/files/pdf/2016/1607NGA_OpioidRoadMap.pdf.

²³⁶ *Ibid.*

²³⁷ Butterworth and Marsteller, “Florida in Dire Need of Criminal Justice Reform.”

localities, LEAD has shown the viability of a program that has the ability to diminish recidivism rates, reduce criminal justice spending, and improve the overall safety of the community.

Ocean County, New Jersey

As previously discussed in the first section of this chapter, often times prosecutors are chief supporters of maintaining a “tough on crime” approach in regards to drug policy. However, in some cases, prosecutor’s offices have been taking the lead in terms of implementing new and creative demand-side approaches. For example, Ocean County’s prosecutor’s office has created a new and simple way to communicate the dangers of opioid use through its “funeral cards,” which “contain information about the dangers of prescription painkillers [and other opioids] alongside instructions for proper disposal of remaining prescriptions. The prosecutor’s office gives these cards to funeral directors, who then hand them out to families of deceased individuals.”²³⁸ While there is no quantitative way to calculate the immediate result of an education-based approach like this, public awareness has become an increasingly popular demand-side strategy on the local level. When a drug epidemic takes hold of a community, public awareness campaigns that “deter new users [from use] are especially effective, as they reduce the pool of “susceptibles,” [those who are at the highest risk of using], and deters existing users from transitioning to regular use.”²³⁹ Educational public awareness campaigns, such as initiatives like this which are funded and promoted by the prosecutor’s office, represents an approach that has been designed as a direct reaction to the opioid epidemic, as many people are unaware of the immediate threats of modern day opioid use.

²³⁸ National Association of Counties and National League of Cities, “A Prescription for Action: Local Leadership in Ending the Opioid Crisis.”

²³⁹ Pacula, 2.

Another program piloted by the Ocean County Prosecutor's Office is its Recovery Coach Program, an eight week-long voluntary recovery program for opioid overdose addicts. The program "connects individuals revived by naloxone with treatment options once they are stabilized in the emergency rooms... working with area hospitals, the program matches an overdose victim with a recovery coach, who, if the patient agrees, will work with the person and help steer him or her towards recovery."²⁴⁰ What is noteworthy about this program is that the coaches are usually in recovery themselves, and their similar experiences and perspectives can perhaps be of more use to the addicts new to recovery than public health officials or law enforcement officers. Moreover, free or subsidized treatment is available for willing participants, in order for their recovery process to continue after the initial eight weeks.²⁴¹ Overall, the program has seen a wide-range of participation, with up to 70% of overdose victims agreeing to participate in the program from its onset, which emphasizes the fact that most addicts *want* treatment.²⁴² This community-based, volunteer recovery support service has become an increasingly popular public health strategy for counteracting the opioid crisis. Because they are "based primarily on shared experiences of addiction and recovery... they can be seen as a bridge between formal systems, such as hospitals, specialty substance abuse treatment providers, drug courts, or correctional institutions, and natural support in the community such as mutual aid groups, family, church, or other groups."²⁴³ Unlike the other demand-side solutions analyzed so

²⁴⁰ National Association of Counties and National League of Cities, "A Prescription for Action: Local Leadership in Ending the Opioid Crisis."

²⁴¹ Ibid.

²⁴² Ibid.

²⁴³ *Fentanyl: The Next Wave of the Opioid Crisis: Testimony Before the Subcommittee on Oversight and Investigations and Committee on Energy and Commerce, United States House of Representatives*, 115th Cong. (March 21, 2017) (statement of Kemp L. Chester, Acting Director of National Drug Control Policy), <http://docs.house.gov/meetings/IF/IF02/20170321/105739/HHRG-115-IF02-Wstate-ChesterK-20170321.pdf>.

far, peer recovery programs that provide former addicts as a resource for those starting out in recovery is an often underutilized component of the treatment process.

Massachusetts

In terms of employing practical and comprehensive demand-side strategies, Massachusetts has been at the forefront of individual state efforts to combat the opioid epidemic. Due to its proximity to New York City, the largest heroin-user market in the northeast, Boston consequently has a quite large heroin distribution market and particularly high levels of drug availability.²⁴⁴ Moreover, in some areas of the state the degree of heroin purity reaches 95%, which exceeds the national average.²⁴⁵ These statistics highlight why Massachusetts has quickly become one of the most devastatingly effected states by the opioid crisis. Subsequently, a large state-wide response to curb the use of opioids, and in particular, fentanyl-infused heroin, followed. In July 2015, Governor Baker's Opioid Working Group released a list of demand-side solutions, including some "bold new strategies," such as increasing access to MAT (Medication-Assisted Treatment), utilizing data to identify hotspots, supporting substance use prevention education in schools, and increasing naloxone access.²⁴⁶

Specifically, the expansion of MAT, which "combines psychosocial therapy with careful opioid administration [such as buprenorphine, naltrexone, and methadone] remains one of the most promising options for curbing opioid abuse."²⁴⁷ Methadone is often regarded as the "gold standard" for treating opioid addiction, however, only 22% of people with an opioid use disorder

²⁴⁴ United States Department of Justice, National Drug Intelligence Center, *National Drug Threat Assessment: 2011*, Department of Justice, August 2011, <https://www.justice.gov/archive/ndic/pubs44/44849/44849p.pdf>

²⁴⁵ Ibid.

²⁴⁶ Murphy et al., 34.

²⁴⁷ M. Scott Brauer, "Inside a Killer Drug Epidemic: A Look at America's Opioid Crisis," *The New York Times*, January 6, 2017, <https://www.nytimes.com/2017/01/06/us/opioid-crisis-epidemic.html>.

currently receive this form of specialty treatment.²⁴⁸ The available research shows the increased effectiveness of using these medications in not only reducing opioid abuse and opioid-related overdose deaths,²⁴⁹ but also criminal activity,²⁵⁰ and infectious disease transmission.²⁵¹ Along with methadone, the FDA's 2002 approval of buprenorphine made it possible for it to be prescribed in both traditional treatment programs and by physicians in their own offices, greatly increasing MAT availability for addicts.²⁵² Lastly, Massachusetts' increased MAT access was made possible in part by the state's approval to take the Medicaid expansion offered through the ACA, which as previously discussed, greatly increased the number of addicts who now have the option to have MAT costs covered by health insurance.

Massachusetts also pioneered an Overdose Education Naloxone Distribution Program (OEND), an educational platform in which public health officials, bystanders, addicts, and their families, learn how to administer naloxone correctly when encountered with an overdose. Participants in the program are trained "to recognize the signs of an overdose, seek help, rescue breathe, use naloxone, and stay with the person who is overdosing."²⁵³ A 2013 groundbreaking study researched the possible effectiveness of the Massachusetts Department of Public Health's expansion of the state's OEND programs from 2007 to 2009 in reducing the number of opioid overdose fatalities. The participants completed a four hour course, a knowledge test about

²⁴⁸ Sarah L. Hedden, et. al., *Behavioral Health Trends in the United States: Results from the 2014 National Survey on Drug Use and Health*, SAMHSA: Center for Behavioral Health Statistics and Quality, September 2015, <https://www.samhsa.gov/data/sites/default/files/NSDUH-FRR1-2014/NSDUH-FRR1-2014.pdf>.

²⁴⁹ Skolnick, 11.3.

²⁵⁰ Chester, 4.

²⁵¹ Robert Schwartz et. al., "Opioid Agonist Treatments and Heroin Overdose Deaths in Baltimore, Maryland, 1995-2009," *American Journal of Public Health* 103, no. 5 (May 1, 2013), <http://ajph.aphapublications.org/doi/abs/10.2105/AJPH.2012.301049>.

²⁵² Pacula, 5.

²⁵³ A.Y. Walley, "Opioid Overdose Rates and Implementation of Overdose Education and Nasal Naloxone Distribution in Massachusetts: Interrupted Time Series Analysis," *British Medical Journal* 346 (2013), <https://www.bmj.com/content/346/bmj.f174>.

reducing polysubstance misuse and not using alone, and learned how to properly assemble the naloxone device and how it should be administered.²⁵⁴ The results of the study showed that, generally, opioid-related death rates decreased in communities that implemented OEND, compared with community-year strata with no OEND implementation.²⁵⁵ Thus, this study demonstrates that OEND can successfully diminish the number of opioid overdose fatalities by providing community members that are most likely to come into contact with someone experiencing an overdose with the knowledge and skills necessary to administer naloxone.

Vermont

More so than any other state, Vermont has taken a unique, innovative approach in terms of combatting the opioid epidemic through demand-side solutions. By the mid-2000s, along with the rest of New England, Vermont was caught up in the second wave of the opioid epidemic. In 2009, John Brooklyn, an addiction specialist, along with other addiction specialists, health care experts, and state government officials noticed that while the state did not have a shortage of doctors able to prescribe buprenorphine, many of them did not have the proper training or support to deal with the rising rates of addiction and overdoses.²⁵⁶ Subsequently, they launched a state-wide program that is modeled after the U.S. health care system – a so-called “hub and spoke” framework in which the “hub” refers to the places where someone first entered into recovery receives intensive treatment, including initial assessment, care coordination, daily methadone or buprenorphine treatment, and therapy services.²⁵⁷ As the addict progresses in their recovery, they move into the “spoke” part of the model, where they receive their follow-up care,

²⁵⁴ Walley.

²⁵⁵ Ibid.

²⁵⁶ German Lopez, “I Looked for a State That’s Taken the Opioid Epidemic Seriously. I Found Vermont,” *Vox*, October 31, 2017, <https://www.vox.com/policy-and-politics/2017/10/30/16339672/opioid-epidemic-vermont-hub-spoke>.

²⁵⁷ Ibid.

such as continuing medication and access to therapy. However, instead of coming in daily, they are granted some freedom and come in on a weekly, monthly, or even less frequent basis, instead of the daily regimen they started under.²⁵⁸ The Vermont state legislature legally authorized the model in 2012, and there are now six hubs in ten different locations throughout the state.²⁵⁹

This holistic, science-based approach spearheaded by addiction specialists themselves is now the norm in Vermont in terms of treating chronic opioid addiction. According to figures from the Centers for Disease Control and Prevention (CDC), the drug overdose death rate for New England was about 24.6 per 100,000 people in 2015, the highest for any region in the country.²⁶⁰ However, Vermont was the only state in New England that was both below the regional average of 15.8 per 100,000 people, *and* below the national average of 16.3 per 100,000 people.²⁶¹ These statistics suggest that at least some of the disparity between Vermont and the rest of New England lies in the fact that it is the only state to implement this creative “hub and spoke” system. Although the “hub and spoke” model was eventually legalized by the Vermont legislature, as Brooklyn’s efforts show, legislation is not necessary for these types of programs to be put in place, as long as they are led by a coordinated group of addiction specialists and other members of the medical field and public health care system.

V. Conclusion

An interesting and often nuanced aspect of the policies discussed throughout this chapter is that not only have they been implemented on the state, city, and county levels, but they have

²⁵⁸ Lopez, “I Looked for a State That’s Taken the Opioid Epidemic Seriously. I Found Vermont.”

²⁵⁹ Ibid.

²⁶⁰ H. Hedegaard, M. Warner, and A.M. Minino, *Drug Overdose Deaths in the United States, 1999-2016: NCHS Data Brief, no. 294*, CDC: Centers for Disease Control and Prevention: National Center for Health Statistics, 2016, <https://www.cdc.gov/drugoverdose/data/statedeaths.html>.

²⁶¹ Ibid.

also popped up in virtually every corner of the United States. Effective demand-side and supply-side policy solutions have been employed in both red and blue states. Innovative approaches and programs have been created in the Northeast, Midwest, and Deep South. Similar treatment programs have been piloted in economically prosperous and financially destitute counties. This observation emphasizes the fact that the opioid epidemic has affected the entire United States. No matter the geographic location, majority political party, economic standing, or specific demographics of the state or locality, law enforcement, public health officials, the medical community, state legislatures, and even the addicts themselves and their support systems are attempting, in some way or another, to combat the epidemic that is tearing their communities apart. All of these coalitions are necessary in order to effectively counteract the epidemic, and these policy approaches provide some examples of successful ways to do so. It is thus pertinent to keep these strategies and solutions in mind when considering how states and localities should continue fight the ongoing crisis.

Chapter V: Ideal Recommendations

“In small towns, suburbs, and rural communities all over America, an evolving epidemic of addiction and overdose is claiming new victims – part of a toxic cocktail of economic and social pressures that’s fraying the social fabric and making it harder and harder for too many Americans to live the lives they dream about and deserve” – Hillary Rodham Clinton, National Council Conference, 2014

I. Introduction

This thesis has attempted to place the opioid epidemic within a supply and demand model in order to evaluate the efficacy of specific policy solutions in a comprehensible manner. Current evidence suggests that “the most effective way to end the current opioid crisis is to take a public health approach [demand-side strategies] focused on preventing and treating opioid use disorder as a chronic disease, while strengthening law enforcement efforts to address illegal supply chain activity [supply-side strategies].”²⁶² There is now a negative connotation associated with federal drug policy and drug epidemics, due to the failed War on Drugs policies and the current administration’s approach. However, there are some supply-side and demand-side solutions that can *only* be instituted by the federal government. By the same token, there are certain supply-side and demand-side policies that are better suited for the state and local levels.

Thus, another framework that the opioid epidemic can be examined through is federalism – that is, deciphering which policies are the most likely to be implemented on the local, state, or federal levels. The opioid crisis is an extremely time sensitive issue. Due to the heightened risks associated with modern-day heroin and fentanyl use, more addicted individuals are *dying* than ever before. Provisional data shows that between May 2016 and May 2017, there has been over a 17% increase in drug overdoses, most of which were opioid-related.²⁶³ Furthermore, a recent

²⁶² Murphy et al., “Finding Solutions to the Prescription Opioid and Heroin Crisis: A Road Map for States.”

²⁶³ F.B. Ahmad, L.M. Rossen, M.R. Spencer, M. Warner, and P. Sutton, *Provisional Drug Overdose Death Counts*, National Center for Health Statistics, 2018, <https://www.cdc.gov/nvss/vsrr/drug-overdose-data.html>.

report by the White House’s Council of Economic Advisors found that previous estimates of the cost of the epidemic “greatly understate” the true value lost – which they approximated to be around \$504 billion, equivalent to 2.8% of the United States’ GDP in 2015.²⁶⁴ These statistics demonstrate the climbing social and economic costs of the opioid epidemic, and underscores the importance of implementing supply and demand policies on *all* levels of government as swiftly as possible. Going forward, no word is more important to keep in mind than “coordination.” The successful mitigation of the epidemic will *have* to include cooperation between federal, state, and local health care systems, government representatives, law enforcement agencies, public health officials, and community groups. Outlined below is a compilation of the most current, evidence-based solutions that can be utilized in an effective manner.

II. Ideal Supply-Side Recommendations

Technically speaking, drug enforcement is a federally mandated policy. However, as discussed in Chapter One, the Reagan administration delegated the drug war to the subnational levels of government through coercive federal programs that brought significant economic incentives. Consequently, state and local police departments became increasingly involved in drug law enforcement.²⁶⁵ What amounted from this massive shift in procedure is what can be deemed the “federalization of drug policy,”²⁶⁶ in which supply-side policies (drug enforcement practices) became active agenda item on the national, state, and local levels of government.

²⁶⁴ United States White House, Executive Office of the President, Council of Economic Advisors, *The Underestimated Cost of the Opioid Epidemic*, The White House, November 2017, <https://www.whitehouse.gov/sites/whitehouse.gov/files/images/The%20Underestimated%20Cost%20of%20the%20Opioid%20Crisis.pdf>.

²⁶⁵ Refer back to Chapter 1, page 19 for an overview of how the Reagan administration persuaded initially hesitant state and local law enforcement agencies to become active participants in the drug war.

²⁶⁶ This concept originates from Lisa L. Miller, *The Perils of Federalism: Race, Poverty, and the Politics of Crime Control*, (Oxford: Oxford University Press, 2008), 23. However, while Miller discusses the “federalization of crime policy” generally, I am applying it specifically to drug policy.

Therefore, supply-side solutions, such as criminal justice reform, law enforcement strategies, interdiction, and border control, must take all three levels of government and their respective agencies into account. It is crucial, then, to assign policy initiatives to the proper jurisdiction. In general, the federal government is the most well equipped to employ supply-side policies due to its constitutional authority and control over specialized drug enforcement agencies. Nevertheless, because of their relatively new role in drug policy, state and local governments and agencies also need to implement or improve their enforcement strategies and criminal justice approaches.

So far, much of this thesis has been devoted to the argument that the supply-side policies introduced in the drug war era have failed to curb drug trafficking and addiction rates to any significant degree, and have caused detrimental effects on American society. However, this catastrophe was mainly due to the fact that *only* supply-side solutions were put in place, which do not address the steady demand of addicted users throughout the past fifty years. Moreover, the scope of strictly supply-side interventions is even more limited due to the presence of substitutes.²⁶⁷ Thus, the need for both effective supply-side *and* demand-side policies is perhaps the most important point to take away from this entire project.

Federal Level Supply-Side Policies

The magnitude of the opioid epidemic has reached global proportions. Unlike the first wave of the crisis, which was driven by prescription painkillers manufactured on American soil, most of the heroin and fentanyl found in the U.S. today have been illegally trafficked into the country. As the availability of prescription opioids plummeted due to the institution of abuse-deterrent reformulations and state prescribing limits, addicts quickly turned to heroin.

Consequently, the supply of heroin and fentanyl-infused heroin began to grow in order to meet

²⁶⁷ Refer back to Chapter 3, page 43 for an explanation of why the presence of substitute drugs makes supply-side policies basically ineffective on their own.

the new demand. This phenomenon is especially troublesome because although heroin is used by a smaller number of people than other major drugs, it is much more deadly. For example, current cocaine users outnumbered heroin users by approximately 3.5 times in 2014, but heroin-involved overdose deaths were *twice* those of cocaine.²⁶⁸ Thus, the federal government's urgent need to implement policies to diminish the supply of heroin and fentanyl must be a policy priority.

Criminal Justice Reform

Before discussing the supply-side policies that the federal government must employ *outside* the United States, it is necessary to evaluate the federal criminal justice system that dictates how drug crimes are treated *inside* the country. As discussed in Chapter One, there are a few pieces of key legislation passed during the drug war era that shaped national drug policy in an attempt to stem the flow of illicit drugs. The Controlled Substances Act of 1970 had a particularly significant role in this process, as it established the federal drug policy under which the manufacture, importation, possession, use, and distribution of certain substances is regulated.²⁶⁹ The statute created the five Schedules (classifications) of drugs, which depend upon the drug's acceptable medical use and its abuse or dependency potential, with Schedule I being the most dangerous.²⁷⁰ Under this act, heroin is classified as a Schedule I drug, and defined as a "drug with no currently accepted medical use and a high potential for abuse."²⁷¹ Fentanyl is classified as a Schedule II drug, and defined as a "drug with a high potential for abuse, with use potentially leading to severe psychological or physical dependence."²⁷² These classifications are

²⁶⁸ "National Heroin Threat Assessment Summary," Drug Enforcement Administration, 2016, https://www.dea.gov/divisions/hq/2016/hq062716_attach.pdf.

²⁶⁹ 21 U.S.C. § 801 (1970).

²⁷⁰ "Drug Scheduling," Drug Enforcement Administration, N.d., <https://www.dea.gov/druginfo/ds.shtml>.

²⁷¹ *Ibid.*

²⁷² *Ibid.*

important to keep in mind, as the severity of federal trafficking penalties mainly depends on the Schedule of the drug.

Furthermore, the Anti-Abuse Drug Act of 1986 and Violent Crime Control Law Enforcement Act of 1994 both implemented draconian penalties for drug trafficking. The Anti-Abuse Act of 1986 instituted the death penalty for major traffickers, life in prison for some repeat offenders, far more severe penalties for possession, and new mandatory minimums for drug offenses with no intent to sell.²⁷³ In a similar fashion, the Violent Crime Control Law Enforcement Act of 1994 employed the “three strikes” mandatory life sentence for repeat offenders.²⁷⁴ A direct effect of this legislation is that as of 2016, 47% of all federal prisoners were imprisoned for drug offenses, and of those drug offenses, 99% were for drug trafficking.²⁷⁵ An unintended consequence of these laws that is highlighted by these statistics is that many prisoners are incarcerated for low-level, nonviolent drug crimes, instead of high-level drug trafficking offenses.

With that being said, two modifications to federal drug trafficking penalties include eliminating mandatory minimums for drug offenses with no intent to sell, and decreasing the possession of a controlled substance from a felony to a misdemeanor. Abolishing the mandatory minimum would allow judges to have more discretion over individual cases, and would likely result in fewer convictions of low-level, nonviolent offenders, many of whom need treatment. Furthermore, because misdemeanors are considered a “lesser” criminal act than felonies, they are punished less severely and usually result in monetary fines instead of prison time.²⁷⁶ Not only is

²⁷³ Refer back to Chapter 1, page 16 for more information on this legislation.

²⁷⁴ Refer back to Chapter 1, page 17 for more information on this legislation.

²⁷⁵ E. Ann Carson, *Prisoners in 2016*, Bureau of Justice Statistics, January 9, 2018, <https://www.bjs.gov/index.cfm?ty=pbdetail&iid=6187>.

²⁷⁶ “Summary Offences and the Crown Court: Legal Guidance,” The Crown Prosecution Service, January 27, 2017, www.cps.gov.uk.

treating possession of a controlled substance as a felony extremely punitive, but it is also counterintuitive because it has resulted in many addicts ending up in federal prison instead of treatment. Lastly, it is likely that the diversion of these addicts into treatment instead of prison would help curb the extremely high rates of mass incarceration in the United States.

Another criminal justice reform that needs to be implemented on the federal level is a specific penalty for fentanyl trafficking. On November 9th, 2017, the Department of Justice announced a policy that is somewhat in line with this recommendation. This DEA policy declares that “anyone who possesses, imports, distributes, or manufactures any illicit analogue will be subject to criminal prosecution in the same manner as for fentanyl and other controlled substances.”²⁷⁷ In other words, this order temporarily classifies all fentanyl analogues as Schedule II drugs. Thus, the order makes it easier for federal prosecutors to prosecute traffickers for all fentanyl-related substances, as it classifies them all in the same Schedule.²⁷⁸ The only weakness of this policy is that it constitutes a temporarily scheduling, which means that it will only last up to two years.²⁷⁹ It is unlikely that the supply of fentanyl and its analogues will be completely eradicated within two years, and thus a more permanent form of this policy needs to be implemented. In light of the previous discussion, model drug laws at the federal level include:

(1) Elimination of Mandatory Minimum Reform Act:

To eliminate mandatory minimum sentences for all drug offenses.²⁸⁰

(2) Drug Possession Reform Act:

To reduce drug possession from a felony to a misdemeanor.”²⁸¹

²⁷⁷ “Department of Justice Announces Significant Tool in Prosecuting Opioid Traffickers in Emergency Scheduling of All Fentanyls,” Drug Enforcement Administration, November 9, 2017, <https://www.dea.gov/divisions/hq/2017/hq110917.shtml>.

²⁷⁸ Ibid.

²⁷⁹ Ibid.

²⁸⁰ Model language derived from H.R. 3800, 115th Cong. (2017).

²⁸¹ Model language derived from California Proposition 47 (2014).

(3) Illicit Fentanyl Analogue Scheduling Act:

Makes any illicit fentanyl analogue a Schedule II drug. Provides that anyone who possess, imports, distributes, or manufactures any illicit fentanyl analogue will be subject to criminal prosecution in the same manner as for fentanyl and other controlled substances.²⁸²

Law Enforcement Strategies

The authority and size of federal drug enforcement agencies are very broad, considering that the DEA (Drug Enforcement Agency)²⁸³, FBI (Federal Bureau of Investigation)²⁸⁴, ICE (U.S. Immigration and Customs Enforcement)²⁸⁵, and CBP (Customs and Border Protection)²⁸⁶ all play some role in federal drug enforcement, and combined total over 128,000 personnel and a \$29 billion annual budget. Therefore, coordination between these agencies, alongside state and local law enforcement departments, is necessary to curtail the supply of opioids entering the U.S. This “all hands on deck” approach is exemplified by High Intensity Drug Trafficking Areas (HIDTA) programs, which provide “assistance to federal, state, and local law enforcement agencies operating in areas determined to be critical drug trafficking areas.”²⁸⁷ This grant program is administered by the ONDCP, and there are currently twenty-eighty active HIDTAs throughout the country, covering nearly 18% of all counties and 66% of the population.²⁸⁸ The HIDTAs are national programs that are funded by a federal entity, the Office of National Drug Control Policy (ONDCP), and run by a federal agency, the DEA. This effort illustrates how

²⁸² “Department of Justice Announces Significant Tool in Prosecuting Opioid Traffickers in Emergency Scheduling of All Fentanyl.”

²⁸³ United States Department of Justice, Drug Enforcement Administration, *FY 2017 Budget Request At a Glance*, United States Department of Justice, N.d., <https://www.justice.gov/jmd/file/822096/download>.

²⁸⁴ *Statement Before the House Appropriations Committee, Subcommittee on Commerce, Justice, Science, and Related Agencies, United States House of Representatives*, 114th Cong. (2016) (statement of James B. Comey, FBI Director), <https://www.fbi.gov/news/testimony/fbi-budget-request-for-fiscal-year-2017>.

²⁸⁵ Department of Homeland Security, *Budget-in-Brief: Fiscal Year 2017*, Department of Homeland Security, N.d., <https://www.dhs.gov/sites/default/files/publications/FY2017BIB.pdf>.

²⁸⁶ *Ibid.*

²⁸⁷ “DEA Programs: High Intensity Drug Trafficking Areas (HIDTAs),” Drug Enforcement Administration, N.d., <https://www.dea.gov/ops/hidta.shtml>.

²⁸⁸ *Ibid.*

coordination among all three levels of government facilitates achieving the common goal of diminishing the supply of drugs that fuel the epidemic. For example, at the local level, HIDTAs are directed by Executive Boards composed of an equal number of federal and non-federal law enforcement leaders.²⁸⁹ These programs have become so widespread that prominent state-level organizations, such as the National Governors Association, recommend that “wherever possible, [states should] designate HIDTAs as the central source for state drug intelligence.”²⁹⁰ While HIDTAs already exist all over the country, more need to be established in particularly affected communities that are not currently benefitting from this type of program.

Interdiction

Due to the high potency, availability, and inexpensiveness of fentanyl, transnational criminal organizations are increasingly utilizing the synthetic opioid as a filler for heroin. Moreover, synthetic opioids are now a significant contributor to opioid-related deaths in the U.S., evidenced by the fact that out of the 33,091 opioid overdose deaths reported in 2015, 9,580 were caused by fentanyl or fentanyl-related substances, a 72.2% increase from the previous year.²⁹¹ Thus, the ability of federal drug enforcement agencies to use interdiction, the interception of illegal drugs smuggled by air, sea, or land, is a crucial component of federal supply-side strategy.²⁹² Since China and Mexico are the two main source countries for illicit fentanyl smuggled into the U.S., interdiction measures must be focused mainly on these nations.²⁹³ A possible challenge posed by interdiction is that the effective curtailment of a supply

²⁸⁹ “DEA Programs: High Intensity Drug Trafficking Areas (HIDTAs).”

²⁹⁰ Murphy et al., “Finding Solutions to the Prescription Opioid and Heroin Crisis: A Road Map for States.”

²⁹¹ “Increases in Drug and Opioid-Involved Overdose Deaths – United States 2010-2015,” Centers for Disease Control and Prevention, December 30, 2016, https://www.cdc.gov/mmwr/volumes/65/wr/mm655051e1.htm?utm_campaign=colorado.ourcommunitynow.com%20website&utm_source=ocn_story&utm_medium=website.

²⁹² “Interdiction,” Def. 1, The Free Dictionary, accessed April 16, 2018, <https://www.thefreedictionary.com/drug+interdiction>.

²⁹³ United States Department of Justice, Drug Enforcement Administration, *Fentanyl: A Briefing Guide for First Responders*, Drug Enforcement Administration, June 2017, https://www.dea.gov/druginfo/Fentanyl_Briefing

from one country might lead to another one picking up where the original country left off. For example, Nixon's 1973 major interdiction effort, Operation Intercept, successfully curbed the supply of opium and marijuana from entering the United States through Mexico, only to have Colombia quickly replace Mexico as the United States' main supplier.²⁹⁴ However, this type of situation can be avoided if interdiction is coupled with demand-side strategies that can simultaneously decrease the demand for drugs.

In January of 2017, President Trump signed the Interdiction Act, which provides federal agents with additional tools for detecting fentanyl and other synthetic opioids at the Mexican border.²⁹⁵ These resources include granting the CBP access to the latest chemical screening devices that can detect and intercept synthetic opioids, which could be hidden in packages, mail, or on travelers themselves.²⁹⁶ Considering that fentanyl is packaged and transported in extremely small doses, this is an important policy to implement. While this policy should be regarded as one of the few logical supply-side solutions put forth by the Trump administration thus far, a challenge to these supply-reduction policies that has surfaced over the past decade is the use of technology, specifically the Internet, for drug trafficking. Known colloquially as the "Internet of Dope,"²⁹⁷ transnational drug trafficking crime organizations use this tactic to widely expand their customer base. Recent reports from the DEA show that in particular, China-based trafficking organizations have been using the Internet to globally distribute fentanyl, fentanyl-related substances, and synthetic opioids.²⁹⁸ Traditional interdiction methods do not suffice for this type

GuideforFirstResponders_June2017.pdf.

²⁹⁴ Refer back to Chapter 1, page 13 for a review of this operation and its consequences.

²⁹⁵ Refer back to Chapter 3, page 58.

²⁹⁶ Manuel Balce Ceneta, "President Donald Trump Signs into Law the Bipartisan Interdict Act," January 10, 2018, https://www.washingtontimes.com/multimedia/image/trump_opioids_36665jpg-071adjpg/.

²⁹⁷ Quinones, 317.

²⁹⁸ United States Department of Justice, Drug Enforcement Administration, *Fentanyl: A Briefing Guide for First Responders*.

of trafficking that occurs on computer screens. Thus, federal law enforcement agencies need to utilize their data and information-sharing networks and surveillance techniques as much as possible in order to pinpoint the online activity of these trafficking organizations.

Border Control

Because the bulk of illicit heroin and fentanyl arrives in the United States via Mexico and Canada, border control is an especially significant federal supply-reduction strategy. The southwest Mexican-American border is particularly vulnerable because of the intricate infrastructure, proximity, and dominance of Mexican trafficking organizations over the U.S. drug trade.²⁹⁹ Over the past few decades, they have maintained territorial influence over large regions in Mexico for the cultivation, production, importation, and transportation of illegal drugs, and subsequently “[have been] able to introduce multi-ton quantities of illicit drugs into the United States on a yearly basis.”³⁰⁰ The majority of these illegal drugs are smuggled into the U.S. over land by vehicles, and other traditional methods such as the use of backpackers on land trails that cross remote areas of the border.³⁰¹ Therefore, the vigilant enforcement of this area is crucial in diminishing the supply of heroin and fentanyl that is entering the U.S. through this route.

One such program is the Southwest Border Initiative (SWBI), a cooperative unit that consists of the DEA, FBI, ICE, U.S. Customs Service, and U.S. Attorney’s offices. The SWBI was put in place in order to combat the threat posed by the Mexico-based trafficking groups operating along the Southwest border, by targeting the communication systems of their command and control centers.³⁰² This multi-faceted strategy allows for these federal agencies to

²⁹⁹ United States Department of Justice, Drug Enforcement Administration, *2016 National Drug Threat Assessment Summary*, Drug Enforcement Administration, November 2016, <https://www.dea.gov/resource-center/2016%20NDTA%20Summary.pdf>.

³⁰⁰ *Ibid.*

³⁰¹ *Ibid.*

³⁰² United States Department of Justice, Drug Enforcement Administration, *2016 National Drug Threat Assessment Summary*.

efficiently track drug trafficking as it flows from Mexico into the United States. Since its inception in 1994, three of these operations have culminated in the arrest of 156 individuals and the seizure of over 22,000 kilos of illegal drugs.³⁰³ Because most of the heroin and fentanyl driving the opioid epidemic is coming into the U.S. by this route, expanding the program would likely have a positive impact in diminishing the amount of these drugs that cross the border.

Diplomacy and International Engagement with Source Countries

While the national government can impose harsher penalties for high-level fentanyl traffickers and the federal drug enforcement agencies can institute stricter interdiction and border control policies, it is important to note that source countries' laws also affect the U.S. drug trade. Therefore, diplomatic engagement between the U.S., Mexico, and China is necessary to reduce the supply of opioids. Some of these engagements have resulted in annual meetings or events, such as the North American Drug Dialogue (NADD), held in October 2016 between the U.S., Canada, and Mexico, which focused on the opioid crisis and paid particular attention to heroin and illicit fentanyl.³⁰⁴ The U.S. also recently held a NADD technical workshop in which all three delegations met for four days of information exchange, and resulted in a list of tangible policies for all three countries to implement to address the heroin and fentanyl issue.³⁰⁵ In regards to China, following the U.S.'s request for better regulation of Chinese chemical and pharmaceutical industries at a number of high-level meetings, China domestically controlled 116 fentanyl analogues.³⁰⁶ These examples highlight that international coordination can not only provide a system of information exchange, but it can also explicitly change other countries' drug policies.

³⁰³ Ibid.

³⁰⁴ Chester, 8.

³⁰⁵ Ibid.

³⁰⁶ Chester, 8.

State Level Supply-Side Policies

The federal government and its agencies have the broader scope, authority, and resources to implement supply-side policies compared to the state or local levels. However, due to the federalization of drug policy that occurred during the drug war era, states and localities were given the opportunity to expand into the arena of drug policy. Subsequently, most instituted their own criminal justice and law enforcement policies devoted specifically to drug enforcement. Unfortunately, most states initially followed the national “tough on crime” trend of the time and implemented draconian drug laws and strategies throughout the 1980s and 1990s.³⁰⁷ The detrimental effects of these policies are reflected in the fact that out of all of the prisoners in the United States, around 85% are incarcerated on the state level.³⁰⁸ Moreover, as of 2005, four out of five drug arrests on the state level were for possession, while only one in five were for the intent to sell.³⁰⁹ Consequently, there is a need for states to reform their punitive drug laws so that they are consistent with reform at the federal level. Likewise, the federalization of drug policy also thrust state and local law enforcement agencies into an active drug enforcement role that transformed them into militarized units.³¹⁰ Therefore, there is a necessity for both legislative modification and law enforcement strategy reform in order to achieve successful implementation of supply-side policies on the state and local levels.

Criminal Justice Reform

As is recommended at the federal level, one of the of the most important changes to state drug laws that should be implemented wherever feasible is the elimination of mandatory

³⁰⁷ Refer back to Chapter 1, page 18 for specific examples of state law legislation.

³⁰⁸ E. Ann Carson, *Prisoners in 2016*.

³⁰⁹ Refer back to Chapter 1, page 22 for statistics about the effects of drug war era criminal justice policies and drug laws instituted on the state level.

³¹⁰ Refer back to Chapter 1, pages 19-21 for an overview of how the coercion of state and local police departments into carrying out drug enforcement led to a militarized police state.

minimums. Fortunately, throughout the past decade, nineteen states have made some kind of reform to their mandatory minimum laws.³¹¹ Considering the examples provided in Chapter Four, the discussion below suggests a few model laws that individual states should implement in order to both scale back draconian policies that trap addicts in the penal system and also impose harsher, more tailored penalties that specifically target the trafficking of fentanyl. Please refer back to Chapter Four for detailed explanations of each type of law and why they should be implemented on the state level.³¹²

(1) Elimination of Mandatory Minimum Reform Act:

To eliminate mandatory minimum sentences for all drug offenses.³¹³

(2) Fentanyl Trafficking Act:

Makes it a trafficking offense to possess 2 or more grams of fentanyl powder or 90 or more individual bags, folds, packages, envelopes, or containers of any kind containing fentanyl powder. Makes it an offense to “furnish” controlled substances by possession of 2 grams or more of fentanyl powder or at least 45, but fewer than 90 individual bags, folds, packages, envelopes, or containers of any kind containing fentanyl powder. Defines "fentanyl powder" as any compound, mixture or preparation, in granular or powder form, containing fentanyl.³¹⁴

(3) “Three Strikes” Reform Act:

To remove the mandatory life sentence for a nonviolent, non-serious offense under the three strikes law.³¹⁵

(4) Drug Possession Reform Act:

To reduce drug possession from a felony to a misdemeanor.³¹⁶

³¹¹ “State Reforms to Mandatory Minimum Sentencing Laws,” Families Against Mandatory Minimums, November, 2017, <http://famm.org/wp-content/uploads/2017/11/Chart-STATE-REFORMS-TO-MANDATORY-MINIMUM-SENTENCING-LAWS-Nov-2017.pdf>.

³¹² Refer back to Chapter 4, pages 70-75 for explanations as to why these specific laws should be implemented or modified on the state level.

³¹³ Model language derived from H.R. 3800, 115th Cong. (2017).

³¹⁴ Model language derived from 17-A MRSA § 1101 (2017).

³¹⁵ Model language derived from California Proposition 36 (2012).

³¹⁶ Model language derived from California Proposition 47 (2014).

(5) Trafficking Fentanyl in the First Degree Act:

Prohibits trafficking of fentanyl. Provides that a person is guilty of trafficking in a controlled substance in the first degree when he or she knowingly and unlawfully traffics any quantity of heroin, fentanyl, carfentanil, or fentanyl derivatives. A first offense is a class C felony and a second offense is a class B felony. Requires an offer to serve at least 50% of their sentence.³¹⁷

(6) Aggravated Trafficking Misrepresented Fentanyl in the First Degree Act:

Prohibits trafficking in a misrepresented controlled substances. Provides that a person is guilty of trafficking in a misrepresented controlled substances when he or she knowingly and unlawfully sells or distributes fentanyl, carfentanil, or any schedule I substance while misrepresenting the identity of the drug being sold or distributed as a legitimate pharmaceutical product, which is a Class D felony.³¹⁸

Law Enforcement Strategies

As previously mentioned, the drug war era's federalization of drug policy culminated in a major shift from community to military-style state and local policing.³¹⁹ While this transformation carried adverse consequences, it is now clear that state and local police departments' ability to actively participate in drug law enforcement can be utilized in a more effective way. In other words, instead of taking the hardline, "tough on crime" approach adopted by these state and local departments during the War on Drugs, they are now able to coordinate with both federal agencies and each other in a more inter-jurisdictional, community-based approach. Drug use and addiction *is* an important issue in many communities. These state and local law enforcement agencies now have the opportunity to respond directly to their citizenry and employ harm reduction-based policies and effective supply-reduction strategies, instead of following the crime control policy approach put forth on the federal level.

³¹⁷ Model language derived from KRS § 218A 1412 (2017).

³¹⁸ Model language derived from KRS § 218A 142 (2017).

One of the ways that states and localities, specifically counties, can institute these coordinated strategies is through the utilization of regional task forces. Regional task forces are necessary to achieve significant supply-reduction because drug trafficking often cuts across state and county lines. Furthermore, unless the drug crime was committed in more than one state, there is no guarantee that the federal agencies like the DEA or the FBI will become involved. These regional task forces allow for the creation of extensive data collection sharing networks and long-standing partnerships, which overall have resulted in better drug enforcement that can now specifically target heroin and fentanyl.³²⁰ For example, several counties that are adjacent to each other can form a “Drug Strike Force” through an inter-local agreement. This Drug Strike Force can allow the counties’ law enforcement agencies and community organizations to share intelligence with one another, conduct combined surveillance and undercover operations, and form long-term, cooperative investigations.³²¹ Furthermore, the regional Drug Strike Force can provide both undercover narcotics and on-site training to police departments that need it.

Another regional task force to consider is the Drug Market Intervention (DMI) strategy, which targets hot-spot drug markets by engaging directly in communities to identify street-level dealers, arrest violent offenders, and develop prosecutable drug cases for nonviolent dealers. This approach allows law enforcement to put dealers on notice that any future dealing will result in certain, immediate sanctions.³²² DMI is a uniquely successful strategy, as it relies on the coordination between law enforcement, government officials, and the offenders themselves. Thus, this community-based, cooperative approach, along with regional Drug Strike Forces

³²⁰ Murphy et al., “Finding Solutions to the Prescription Opioid and Heroin Crisis: A Road Map for States.”

³²¹ Refer back to Chapter 4, pages 102-103 for an example of a real tri-county regional drug task force.

³²² “Drug Market Intervention.”

should be taken into serious consideration by state and local law enforcement agencies that are trying to stem the supply of opioids in their jurisdictions.

III. Ideal Demand-Side Recommendations

A substantial amount of this thesis has been dedicated to identifying and analyzing the many factors that contribute to the opioid epidemic, which make finding policy solutions particularly challenging. In spite of this reality, there is one factor that may make implementing demand-side policies a little easier than it has been in previous epidemics: the growing recognition among the health care industry, medical field, policymakers, public health officials, law enforcement, and citizens that addiction is a chronic, treatable, medical *disease*. Of course, there is still stigmatization surrounding drug use, and there most likely always will be, especially for illicit drugs like heroin that are used intravenously. However, the significance of this shift in the national collective attitude regarding how people think about addiction is that demand-side policies have become increasingly included on the policy agendas on all three levels of government. Unlike earlier epidemics, the vast majority of people now believe that drug addiction *can* be treated, and also that it *should* be treated. With that being said, and taking into consideration the supply-side policies listed in the previous section of this chapter, it is now a prudent time to focus on the other side of the supply and demand framework: the addicted users that constitute the “demand” for opioids in this ongoing crisis.

As discussed, demand-side policies refer to treatment, rehabilitation, and prevention strategies that lower the demand for drugs.³²³ More specifically, these demand-side solutions need to include a combination of both use reduction (which aims to decrease the volume of illicit-drug consumption) and harm reduction (which seeks to reduce the harmful consequences

³²³ Refer back to Chapter 1, Section II for an overview on demand-side policies.

associated with such use, even if policy measures don't reduce overall use).³²⁴ In theory, demand-side policies could be implemented on the federal, state, or local levels. However, most of these strategies have been instituted on the lower levels of government, including those that are the most effective and successful. On the other hand, the national government's most significant role has been, and should continue to be, providing more funding for these programs.

Federal Level Demand-Side Policies

Theoretically speaking, the federal government could impose a wide array of demand-side policies if it wanted to. Legally, federally-mandated demand-reduction strategies could be instituted because the national government has pre-emptive authority and funding capabilities that supersede state and local governments. For example, following a rise in rampant drug use and addiction in the 1990s, Portugal's national government adopted the National Strategy for the Fight Against Drugs in 1999. This nation-wide strategy included a vast expansion of harm reduction efforts, and doubled the government's investment in drug treatment and drug prevention services.³²⁵ Technically, the United States government could take a similar approach by implementing a homogeneous, national strategy geared towards harm and use reduction. However, this tactic has never been, and likely never will be, adopted by the United States because of the polarized political climate at the national level and the delegation of public health authority to states and localities. Although combating the opioid epidemic is one of the few issues that *does* garner bipartisan support, it is unlikely that the Republicans and Democrats could form a strategy that both sides agree on. Furthermore, considering the current presidential administration's "tough on crime" rhetoric, it is also not likely that this will be achieved through

³²⁴ Frank, 606.

³²⁵ "Portuguese Drug Strategy," European Monitoring Centre for Drugs and Drug Addiction, N.d., http://www.emcdda.europa.eu/system/files/att_119431_EN_Portugal%20Drug%20strategy%201999.pdf.

executive action. Therefore, demand-side solutions should be implemented on the state and local levels, while the federal government can provide monetary support for the programs.

Expanded Funding

Throughout the drug war era, the federal government gained a reputation for repeatedly appropriating more funding to agencies tasked with supply-side solutions, such as the DEA, FBI, and Department of Defense, as opposed to agencies that typically carry out demand-side strategies, such as the National Institute of Drug Abuse and Department of Education.³²⁶ However, as demand-side solutions started to gain more legitimacy and political support, the federal government has begun to gradually dedicate more funding and grants toward these types of policies. For example, Trump's recent omnibus bill added \$3.3 billion to address the opioid crisis for fiscal year 2018. The allocations include \$1.4 billion towards the Substance Abuse and Mental Health Services Administration (\$1 billion for a new State Opioid Response Grant Program), and \$350 million to the Centers for Disease Control and Prevention (CDC) for opioid overdose prevention, surveillance, and state prescription drug monitoring programs. In addition, \$415 million was allocated for the Health Resources and Services Administration to improve access to addiction treatment in rural and other underserved areas, and \$100 million was targeted for the Administration for Children and Families to help children whose parents misuse drugs.³²⁷ This funding is in addition to the \$1 billion in grant funding awarded to states for opioid-related efforts in fiscal year 2018, approved by the 21st Century Cures Act.³²⁸

This increase of funding for mainly demand-side, public health-based solutions is a step

³²⁶ Refer back to Chapter 1, page 5 for specific statistics.

³²⁷ German Lopez, "Congress's Omnibus Bill Adds \$3.3 Billion to Fight the Opioid Crisis. It's Not Enough," *Vox*, March 22, 2018, <https://www.vox.com/policy-and-politics/2018/3/22/17150294/congress-omnibus-bill-opioid-epidemic>.

³²⁸ Refer back to Chapter 3, page 105 for more information about the 21st Century Cures Act.

in the right direction in terms of how the federal government should be appropriating funding for states and localities. However, some critics note that even this large commitment of money is not enough and is dwarfed compared to the funding for other types of diseases. For example, the annual budget for illnesses like HIV is \$32 billion, almost ten times the amount that the 21st Cures Act and the omnibus bill combined provides for the opioid crisis.³²⁹ Especially because the opioid epidemic is a growing, ongoing crisis, there is a dire need for consistent, sustainable funding that will last past fiscal year 2018. Yet, the fact that Congress is now dedicated to providing money for mainly demand-side policies *at all* is a monumental achievement and should be expanded upon greatly, if possible, in the coming years.

When considering the federal role in financially supporting state and local demand-side policies, the national government can be especially useful in providing funding for healthcare programs that offer treatment services for opioid addicts. As previously discussed at length in Chapter Three, the Affordable Care Act (ACA) was a piece of landmark legislation because the Medicaid expansion provided millions of previously uninsured addicts with health insurance. Furthermore, it legally deemed addiction treatment as an “essential health benefit,” which added substance use disorder rehabilitation and services into mainstream healthcare coverage plans.³³⁰ Most significantly, the ACA provided states that took the Medicaid expansion with enhanced federal funding. Subsequently, 40% of adults that suffer from an opioid addiction are now covered by Medicaid and can use their plans for treatment services.³³¹ Despite the efforts of the current administration to repeal the ACA, it seems unlikely that this extremely beneficial

³²⁹ Lopez, “Congress’s Omnibus Bill Adds \$3.3 Billion to Fight the Opioid Crisis. It’s Not Enough.”

³³⁰ Refer back to Chapter 3, page 54.

³³¹ Refer back to Chapter 3, page 54.

healthcare program will be altered any time soon, and should continue to be utilized in a way that helps addicts get the treatment they need.

State Level Demand-Side Policies

Out of every policy recommendation mentioned thus far, demand-side solutions implemented on the state and local levels are perhaps the most important to take into consideration because they have the greatest ability to save human lives. This is emphasized by the fact that not only do states and localities carry most of the financial costs caused by the opioid crisis, but they also “shoulder the majority of the social burden.”³³² Due to the structure of federalism, many national government officials, such as senators and congressman, do not come in contact with the actual reality of the destruction the opioid crisis has left in its wake. Because of their proximity to the communities they serve, officials and agents operating on the subnational levels are more likely to experience the human and societal damages the epidemic has caused. They are confronted in their offices by community groups advocating for change. They attend town meetings in which their constituents who have lost loved ones to overdoses tearfully plead for them to take action. State and local police, firefighters, EMTs, and other first responders witness multiple overdoses and overdose fatalities every day.

Therefore, state and local governments, public health officials, law enforcement agencies, and first responders have the most knowledge of the core problems created by the opioid epidemic, and thus, are best situated to fix them. It is imperative to remember demand-side solutions implemented on the state and local levels are of the *utmost* necessity. No other type of

³³² Lee C. Bollinger et al., “Ending the Opioid Crisis: A Practical Guide for State Policymakers,” The National Center on Addiction and Substance Abuse, October 2017, <https://www.centeronaddiction.org/newsroom>.

policy at any other level of government has a greater ability to save some of the 115 lives that are currently being lost every single day due to a drug overdose.³³³

State Budgets and Expanded Funding

Generally, in comparison with the federal government, state governments allocate more funding toward demand-side than supply-side policies. This is partly due to the fact that states “play a central role in protecting public health and safety; regulating health care providers; establishing prescription drug monitoring programs; and paying for care through Medicaid, state employee benefits, corrections, and other health programs.”³³⁴ Therefore, because they have direct authority over the policy areas that are related to, and affected by, demand-side solutions, they are better equipped to institute these types of policies. While some states are increasing their budgets and funding for demand-reduction strategies, this is not a viable option for economically depressed states. However, there are two other innovative approaches worth mentioning that have successfully gained more demand-side funding for financially strapped states.

Following the national media revelation that pharmaceutical industries, such as Purdue Pharma, were largely responsible for igniting the prescription wave of the epidemic, several state Attorney Generals have filed lawsuits against these companies and have subsequently won extremely large settlements. One of these states is West Virginia, which decided to use the \$24 million from its settlement to expand the availability of treatment for people struggling with addiction.³³⁵ There are currently 41 attorneys with active investigations into these industries, and it is recommended that if they come away with any form of settlements, they should use at least

³³³ “Opioid Overdose Crisis,” National Institute on Drug Abuse, March 2018, <https://www.drugabuse.gov/drugs-abuse/opioids/opioid-overdose-crisis>.

³³⁴ Murphy et al., “Finding Solutions to the Prescription Opioid and Heroin Crisis: A Road Map for States.”

³³⁵ Michael Virtanten, “West Virginia to Spend Opioid Lawsuit Funds on Addiction Treatment Facilities,” *Insurance Journal*, April 13, 2017, <https://www.insurancejournal.com/news/southeast/2017/04/13/447733.htm>.

some portion of the money for demand-side strategies.³³⁶ Another creative policy is Ohio's Opioid Technology Challenge, in which 44 organizations, including universities, hospitals, and pharmaceutical organizations, competed with each other to submit the best project proposal for solutions to the opioid epidemic.³³⁷ While the results of this challenge have yet to be announced, the winner will be awarded grant funding to implement their proposal, which has the ability to yield some solutions that the state has not thought of yet. States that do not have adequate funds in their budgets for demand-reduction strategies should consider this type of policy.

Diversion

Diversion programs are important policies because they can deter individuals convicted of low-level drug offenses into community-based treatment and support services. A particularly successful diversion policy that has not been mentioned thus far is the creation of drug courts. As previously mentioned, one of the most adverse consequences of the punitive drug laws instituted during the War on Drugs era was that addicts were frequently sent to jail instead of treatment. Drug courts are a potential solution to this problem, as they operate as a court system separate from the criminal justice system. The main goal of these courts is to divert nonviolent offenders, many of whom were arrested for mere possession or intent to sell just to support their habit, into treatment programs instead of jail. Currently, all fifty states have working drug courts, totaling more than 2,4000 nationally.³³⁸ However, only one-third of nation-wide drug courts accept MAT

³³⁶ Yuki Noguchi, "State to Investigate Pharmaceutical Companies Over Opioids," *National Public Radio*, September 19, 2017, <https://www.npr.org/sections/thetwo-way/2017/09/19/552135830/41-states-to-investigate-pharmaceutical-companies-over-opioids>.

³³⁷ Katie Zezima, "With Drug Overdoses Soaring, States Limit the Length of Painkiller Prescriptions," *The Washington Post*, August 9, 2017, https://www.washingtonpost.com/politics/with-drug-overdoses-soaring-states-limit-the-length-of-painkiller-prescriptions/2017/08/09/4d5d7e0c-7d0f-11e7-83c7-5bd5460f0d7e_story.html?utm_term=.f1ac23950f7e.

³³⁸ "Drug Courts," U.S. Department of Justice: Office of Justice Programs, May 2017, <https://www.ncjrs.gov/pdffiles1/nij/238527.pdf>.

for defendants.³³⁹ Furthermore, only 40% allow continuation of MAT for those who are already receiving treatment.³⁴⁰ The use of MAT is both feasible and successful in the treatment of opioid addiction, and thus it is important that the drug courts that do not accept MAT as a treatment option, or do not allow defendants to continue it, eliminate those restrictions. Another diversion program that localities should consider implementing is some form of a law enforcement assisted diversion program. LEAD programs function as a pre-booking system, in which addicts are referred to treatment instead of getting charged with a crime. Both drug courts and LEAD programs can be utilized to divert addicts, who otherwise may not have sought treatment, into detoxification and rehabilitation programs.

Treatment, Harm Reduction, and Education

Examples of effective treatment, harm reduction, and education programs were all discussed at length in Chapter Four, and therefore, it is not necessary to go into great depth as to why states and localities should implement them.³⁴¹ I will, however, underscore the importance of implementing such policies. The unfortunate truth is that in the United States, it is much easier to get high than it is to get help. Currently, only 12% of the 22.1 million addicts nation-wide are in treatment for their addictions, although most want to be.³⁴² This is not only due to a lack of bed availability, but also because of the cost of treatment. In some cases, the cost of rehabilitation can be upwards of \$50,000 – about the same for one year’s tuition at a private college.³⁴³ Furthermore, because addiction is a chronic illness, many addicts have to return back to treatment several times throughout their lives, driving up the costs even higher. The

³³⁹ Katel, “Opioid Crisis: Can Recent Reforms Curb the Epidemic.”

³⁴⁰ Ibid.

³⁴¹ Refer back to Chapter 4, Section II for these examples.

³⁴² “Opioids,” Substance Abuse and Mental Health Services Administration, last updated February 23, 2016, <https://www.samhsa.gov/atod/opioids>.

³⁴³ “Cost of Drug and Alcohol Rehab,” Addiction Center, N.d., <https://www.addictioncenter.com/rehab-questions/cost-of-drug-and-alcohol-treatment/>.

implementation of a more affordable and efficient state treatment system, outlined below, can alleviate this pervasive issue.

Along with use-reduction strategies, such as treatment programs, harm reduction strategies are also extremely important for states and localities to implement for reducing the harms associated with opioid use for those unwilling, or more commonly unable, to get help.³⁴⁴ Some of these strategies include syringe access programs, fentanyl test strip distribution, and Overdose Education Naloxone Distribution Programs (OENDs).

Last but certainly not least, education is key. Simply telling adolescents and other particularly vulnerable segments of the population to “just say no” to drugs is like trying to convince them that they are not getting wet in the middle of a rainstorm instead of giving them an umbrella. Educational and prevention initiatives delivered in school and community settings are particularly effective.³⁴⁵ On a wider scale, policy should mandate statewide public awareness campaigns that “educate the public, providers, state policymakers, and other public officials about the risks associated with opioids, the scope of the problem, and the need to destigmatize and raise awareness about treatment and recovery.”³⁴⁶ Prohibition and “just say no” campaigns have repeatedly fallen flat, and it is now time for states and localities to take a more practical, honest approach about educating their citizens about drug use. In conclusion, outlined below are a few model laws derived from the successful programs and legislation mentioned in Chapter Four that can guide states in their efforts to address the opioid epidemic. Please refer back to the individual examples in the previous chapter for explanations as to why these laws are necessary for states to implement in order to successfully diminish the demand for opioids.

³⁴⁴ Refer back to Chapter 4, Section II for explanations as to why these strategies are effective harm-reduction strategies.

³⁴⁵ Compton, 3.

³⁴⁶ Murphy et al., “Finding Solutions to the Prescription Opioid and Heroin Crisis: A Road Map for States”.

Proposed Model State Laws

(1) Opioid Addiction “Hub and Spoke” Treatment Program Act:

A. This act authorizes a regional system of opioid treatment called the Care Alliance for Opioid Treatment, also known as the Hub and Spoke system.

1. Each center, or hub, will serve a defined geographic area and provide comprehensive addictions and co-occurring mental health treatment services to Vermonters with opioid addiction. In addition, these specialized centers will assure the provision of integrated health care, recovery supports, and rehabilitation services for clients of the centers. Each center will provide specialized Medication Assisted Therapy (MAT) for clients in combination with counseling and other services to provide a whole-person approach to the treatment of substance abuse disorders.

2. Less clinically complex patients who require MAT but not methadone will receive treatment within the Spoke system. Spoke entities may be primary care medical homes, Federally Qualified Health Centers, independent physicians (and psychiatrists), or specialty clinic-based outpatient substance abuse treatment providers, all with augmented counseling, health promotion, and care coordination services.³⁴⁷

(2) Prescriber Immunity for Treatment or Prevention of a Drug Overdose with Opioid Antagonist Act:

A licensed health care professional who is permitted by law to prescribe an opioid antagonist may, if acting with reasonable care, prescribe, dispense, or administer an opioid antagonist to treat or prevent a drug overdose without being liable for damages in a civil action or subject to criminal prosecution for prescribing, dispensing or administering such opioid antagonist or for any subsequent use of such opioid antagonist. For purposes of this section, “opioid antagonist” means naloxone hydrochloride or any other similarly acting and equally safe drug approved by the federal Food and Drug Administration for the treatment of drug overdose.³⁴⁸

(3) Pharmacist Immunity for Opioid Antagonist Possession and Administration Act:

A licensed pharmacist may dispense, furnish, or otherwise provide an opioid antagonist in the name of a service program, law enforcement agency, or fire department, without a patient-specific prescription from another medical professional.³⁴⁹

³⁴⁷ “The Opioid Addiction Treatment System: Report to the Vermont Legislature,” Vermont Department of Health, January 15, 2013, <http://www.leg.state.vt.us/reports/2013ExternalReports/285154.pdf>.

³⁴⁸ CT Gen Stat § 17a-714a (2012).

³⁴⁹ IA Code § 147A (2018).

(4) Layperson Release from Liability to Administer Opioid Antagonists Act:

A. A Person authorized under federal, state, or local government regulations, other than a licensed health care professional permitted by law to administer an opioid antagonist to another person if:

1. He, in good faith, believes the other person is experiencing a drug overdose; and
2. He acts with reasonable care in administering the drug to the other person

B. A person who administers an opioid antagonist to another person pursuant to Subsection A of this section shall not be subject to civil liability or criminal prosecution as a result of the administration of the drug.³⁵⁰

(5) Criminal Immunity for Persons who Suffer or Report an Alcohol or Drug Overdose or Other Life Threatening Medical Emergency Act:

A. A person who is experiencing an overdose or other life-threatening medical emergency and anyone (including the person experiencing the emergency) seeking medical attention for that person shall not be arrested, charged, or prosecuted for an offense for which they have been granted immunity pursuant to subsection (B.) of this section, or subject to the revocation or modification of the conditions of probation, if:

1. The person seeking medical attention reports in good faith the emergency to law enforcement, the 9-1-1 system, a poison control center, or to a medical provider, or if the person in good faith assists someone so reporting; and
2. The person provides all relevant medical information as to the cause of the overdose or other life-threatening medical emergency that the person possesses at the scene of the event when a medical provider arrives, or when the person is at the facilities of the medical provider.

B. The immunity shall apply to all offenses that are not class A, B, or C felonies, including but limited to the following offenses:

1. Miscellaneous drug crimes;
2. Illegal possession and delivery of non-controlled prescription drugs;
3. Possession of controlled substances or counterfeit controlled substances;
4. Possession of drug paraphernalia;

³⁵⁰ NM Stat § 24-23-1 (1996).

5. Possession of marijuana.³⁵¹

(6) Prescription Drug Monitoring Program “Must Access” Act:

A. All prescribers in possession of a State Controlled Substance Registration issued by the State, Department of Consumer Protection, will be required to register as a user with the State Prescription Monitoring and Reporting System (PMRS).

B. Prior to prescribing greater than a 72-hour supply of any controlled substance (Schedule II - V) to any patient, the prescribing practitioner or such practitioner's authorized agent shall review the patient's records in the CPMRS at the PMRS Data Collection website.³⁵²

³⁵¹ 2 DE Code § 4769 (2014).

³⁵² CT Public Act § 15-198 (2015).

Conclusion: Realistic Expectations

“A danger or an opportunity.”

-- Chinese definition of a crisis

As this thesis has demonstrated, there is no shortage of possible policy solutions for combatting the opioid epidemic that *can* be implemented on the federal, state, and local levels of government. Successful and practical supply-side and demand-side solutions have already been employed to some extent, and it is likely that additional cooperation and coordination between jurisdictions can increase the effectiveness of these policies. However, at the heart of this crisis lies a fundamental question: is this a battle that the United States *wants* to fight?

It is no secret that in regards to the opioid epidemic, the current president is causing more political polarization and confusion on the federal level than previous administrations. While Trump has promised to be dedicated in his fight against the crisis, it does not seem likely that the policy recommendations I proposed on the federal level, which would allocate more funding and resources to demand-side policies, will come to fruition. There is an overall trend of support for both supply-side and demand-side solutions among state and local governments, several federal entities, and most drug policy experts. However, Trump seems to be solely relying on his inexperienced, and in some cases unqualified, opioid cabinet and continues to revert back to a “tough on crime” approach that is known to be largely ineffective. While he may institute some of my supply-side recommendations, such as increased source country control and interdiction protocols, it is difficult to decipher whether he will seriously consider allocating more funding to states and localities for their own demand-side solutions.

While this may seem disheartening, a silver lining can be found in the fact that presidential administrations *change*. Remarkably, the opioid epidemic is one of the few national

issues that garners bipartisan support, and it is possible that a future administration that offers a more comprehensive and logical approach to drug policy can persuade the Republicans and Democrats to compromise on allocating more demand-side funding to states and localities. Moreover, despite the “tough on crime” rhetoric championed by the executive branch, attitudes surrounding drug abuse and addiction are changing. Thus, it is not unreasonable to assume that following a shift in power, more legislation like CARA and the 21st Century Cures Act will have a chance to pass in Congress.

In the meantime, states and localities have, and will continue to combat the crisis on the ground level every single day. As I have discussed at length, in the face of federal inaction, many subnational jurisdictions have implemented their own innovative policy responses for the opioid epidemic. While the federalization of drug policy may have caused issues during the War on Drugs era, federalism is now utilized in a particularly effective way by states and localities. However, it is crucial to remember that there *needs* to be some form of coordination between states and localities and the federal level in order to optimize the efficacy of these policies and mitigate the epidemic more quickly. Optimistically, this aspiration will become reality in the near future.

Lastly, it is necessary to underscore the importance of ongoing research and evaluation into the opioid crisis, and drug epidemics in general. The more research, studies, and resources that can be produced and subsequently circulated throughout the academic world, governments, and communities, the better chance policymakers will have to institute the newest and most effective strategies. Moreover, as America’s history tells us, it is nearly impossible to prevent drug epidemics from taking root in our society. Therefore, it is critical that evidence based

research which focuses on ways to alleviate these crises continues. The work will never be finished.

A crisis can be considered either as a danger or an opportunity. While the opioid crisis is of course a danger to addicts and society as a whole, it does not have to be. The United States has both the ability and *opportunity* to change how it addresses drug epidemics. These policies are how we can start. This epidemic can provide us with the realization that we, as a nation, have the capability and the willingness to respond to addiction epidemics and formulate lasting and equitable solutions that can improve the health, safety, and quality of life of all American citizens. During the time it took to read this thesis – roughly two hours – ten Americans have died due to an opioid drug overdose. It is my greatest hope that through the successful implementation of these policies, this number will significantly decrease.

Appendix

Federal Supply-Side Laws:

(1) Elimination of Mandatory Minimum Reform Act:

To eliminate mandatory minimum sentences for all drug offenses.

(2) Drug Possession Reform Act:

To reduce drug possession from a felony to a misdemeanor.”

(3) Illicit Fentanyl Analogue Scheduling Act:

Makes any illicit fentanyl analogue a Schedule II drug. Provides that anyone who possess, imports, distributes, or manufactures any illicit fentanyl analogue will be subject to criminal prosecution in the same manner as for fentanyl and other controlled substances.

State Supply-Side Laws:

(1) Elimination of Mandatory Minimum Reform Act:

To eliminate mandatory minimum sentences for all drug offenses.

(2) Fentanyl Trafficking Act:

Makes it a trafficking offense to possess 2 or more grams of fentanyl powder or 90 or more individual bags, folds, packages, envelopes, or containers of any kind containing fentanyl powder. Makes it an offense to “furnish” controlled substances by possession of 2 grams or more of fentanyl powder or at least 45, but fewer than 90 individual bags, folds, packages, envelopes, or containers of any kind containing fentanyl powder. Defines "fentanyl powder" as any compound, mixture or preparation, in granular or powder form, containing fentanyl.

(3) “Three Strikes” Reform Act:

To remove the mandatory life sentence for a nonviolent, non-serious offense under the three strikes law.

(4) Drug Possession Reform Act:

To reduce drug possession from a felony to a misdemeanor

(5) Trafficking Fentanyl in the First Degree Act:

Prohibits trafficking of fentanyl. Provides that a person is guilty of trafficking in a controlled substance in the first degree when he or she knowingly and unlawfully traffics any quantity of heroin, fentanyl, carfentanil, or fentanyl derivatives. A first offense is a class C felony and a second offense is a class B felony. Requires an offer to serve at least 50% of their sentence.

(6) Aggravated Trafficking Misrepresented Fentanyl in the First Degree Act:

Prohibits trafficking in a misrepresented controlled substances. Provides that a person is guilty of trafficking in a misrepresented controlled substances when he or she knowingly and unlawfully sells or distributes fentanyl, carfentanil, or any schedule I substance while misrepresenting the identity of the drug being sold or distributed as a legitimate pharmaceutical product, which is a Class D felony.

State Demand-Side Laws:

(1) Opioid Addiction “Hub and Spoke” Treatment Program Act:

A. This act authorizes a regional system of opioid treatment called the Care Alliance for Opioid Treatment, also known as the Hub and Spoke system.

1. Each center, or hub, will serve a defined geographic area and provide comprehensive addictions and co-occurring mental health treatment services to Vermonters with opioid addiction. In addition, these specialized centers will assure the provision of integrated health care, recovery supports, and rehabilitation services for clients of the centers. Each center will provide specialized Medication Assisted Therapy (MAT) for clients in combination with counseling and other services to provide a whole-person approach to the treatment of substance abuse disorders.

2. Less clinically complex patients who require MAT but not methadone will receive treatment within the Spoke system. Spoke entities may be primary care medical homes, Federally Qualified Health Centers, independent physicians (and psychiatrists), or specialty clinic-based outpatient substance abuse treatment providers, all with augmented counseling, health promotion, and care coordination services.

(2) Prescriber Immunity for Treatment or Prevention of a Drug Overdose with Opioid Antagonist Act:

A licensed health care professional who is permitted by law to prescribe an opioid antagonist may, if acting with reasonable care, prescribe, dispense, or administer an opioid antagonist to treat or prevent a drug overdose without being liable for damages in a civil action or subject to criminal prosecution for prescribing, dispensing or administering such opioid antagonist or for any

subsequent use of such opioid antagonist. For purposes of this section, “opioid antagonist” means naloxone hydrochloride or any other similarly acting and equally safe drug approved by the federal Food and Drug Administration for the treatment of drug overdose.

(3) Pharmacist Immunity for Opioid Antagonist Possession and Administration Act:

A licensed pharmacist may dispense, furnish, or otherwise provide an opioid antagonist in the name of a service program, law enforcement agency, or fire department, without a patient-specific prescription from another medical professional.

(4) Layperson Release from Liability to Administer Opioid Antagonists Act:

A. A Person authorized under federal, state, or local government regulations, other than a licensed health care professional permitted by law to administer an opioid antagonist to another person if:

1. He, in good faith, believes the other person is experiencing a drug overdose; and
2. He acts with reasonable care in administering the drug to the other person

B. A person who administers an opioid antagonist to another person pursuant to Subsection A of this section shall not be subject to civil liability or criminal prosecution as a result of the administration of the drug.

(5) Criminal Immunity for Persons who Suffer or Report an Alcohol or Drug Overdose or Other Life Threatening Medical Emergency Act:

A. A person who is experiencing an overdose or other life-threatening medical emergency and anyone (including the person experiencing the emergency) seeking medical attention for that person shall not be arrested, charged, or prosecuted for an offense for which they have been granted immunity pursuant to subsection (B.) of this section, or subject to the revocation or modification of the conditions of probation, if:

1. The person seeking medical attention reports in good faith the emergency to law enforcement, the 9-1-1 system, a poison control center, or to a medical provider, or if the person in good faith assists someone so reporting; and
2. The person provides all relevant medical information as to the cause of the overdose or other life-threatening medical emergency that the person possesses at the scene of the event when a medical provider arrives, or when the person is at the facilities of the medical provider.

B. The immunity shall apply to all offenses that are not class A, B, or C felonies, including but limited to the following offenses:

1. Miscellaneous drug crimes;
2. Illegal possession and delivery of non-controlled prescription drugs;
3. Possession of controlled substances or counterfeit controlled substances;
4. Possession of drug paraphernalia;
5. Possession of marijuana.

(6) Prescription Drug Monitoring Program “Must Access” Act:

A. All prescribers in possession of a State Controlled Substance Registration issued by the State, Department of Consumer Protection, will be required to register as a user with the State Prescription Monitoring and Reporting System (PMRS).

B. Prior to prescribing greater than a 72-hour supply of any controlled substance (Schedule II - V) to any patient, the prescribing practitioner or such practitioner's authorized agent shall review the patient's records in the CPMRS at the PMRS Data Collection website.

Selected Bibliography

Legal Sources

17-A MRSA § 1101 (2017).

21 U.S.C. § 801 (1970).

34 U.S.C. § 103 (2016).

42 U.S.C. § 1001 (2010).

524 U.S.C. § 101 (2016).

2 DE Code § 4769 (2014).

“California Proposition 36, Changes the in the “Three Strikes Law” (2012)”. *Ballotpedia*. November 6, 2012. [https://ballotpedia.org/California_Proposition_36,_Changes_in_the_%22Three_Strikes%22_Law_\(2012\).](https://ballotpedia.org/California_Proposition_36,_Changes_in_the_%22Three_Strikes%22_Law_(2012).)

“California Proposition 47, Reduced Penalties for Some Crimes Initiative (2014)”. *Ballotpedia*. November 4, 2014. [https://ballotpedia.org/California_Proposition_47,_Reduced_Penalties_for_Some_Crimes_Initiative_\(2014\).](https://ballotpedia.org/California_Proposition_47,_Reduced_Penalties_for_Some_Crimes_Initiative_(2014).)

CT Gen Stat § 17a-714a (2012).

CT Public Act § 15-198 (2015).

“Final Order: Placement of MT-45 Into Schedule I.” *U.S. Department of Justice: Drug Enforcement Administration*. December 13, 2017. https://www.deadiversion.usdoj.gov/fed_regs/rules/2017/fr1213_3.htm

H.R. 335, 102nd Cong. (1994).

H.R. 3355 103rd Cong. (1994).

H.R. 3800, 115th Cong. (2017).

IA Code § 147A (2018).

KRS § 218A 1412 (2017).

KRS § 218A 142 (2017).

NM Stat § 24-23-1 (1996).

Scholarly Articles and Books

- Alexander, Michelle. *The New Jim Crow: Mass Incarceration in the Age of Colorblindness*. New York: New Press, 2010.
- Alpert, Abby, David Powell, and Rosalie Liccardo Pacula. "Supply-Side Drug Policy in the Presence of Substitutes: Evidence from the Introduction of Abuse-Deterrent Opioids." *American Economic Journal* (January 2017): 1-60, https://www.rand.org/pubs/working_papers/WR1181.html.
- Ballanyne, J.C. "Opioids for Chronic Nonterminal Pain." *South Medical Journal* 99, no. 11 (November 2006): 1245-1255, <https://www.ncbi.nlm.nih.gov/pubmed/17195420>.
- Bao, Yuhua, and Roland Sturm. "The Effects of State Mental Health Parity Legislation on Perceived Quality of Insurance Coverage, Perceived Access to Care, and Use of Mental Health Specialty Care." *Health Services Research* 39, no. 5 (October 2004): <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC1361074/>.
- Barlas, Stephen. "U.S. and States Ramp Up Response to Opioid Crisis: Regulatory, Legislative, and Legal Tools Brought to Bear." *Pharmacy and Therapeutics Peer-Reviewed Journal* 42, no. 9 (September 2017), <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5565130/>.
- Barry, Colleen L. and Haiden A. Huskamp. "Moving Beyond Parity – Mental Health and Addiction Care Under the ACA." *The New England Journal of Medicine* 365 (September 2011): 973-975, <http://www.nejm.org/doi/full/10.1056/NEJMp1108649>.
- Bascuas, Ricardo J. "Fourth Amendment Lessons from the Highway and the Subway: A Principled Approach to Suspicionless Searches." *Rutgers Law Journal* 38, no. 3 (Spring 2007), https://papers.ssrn.com/sol3/papers.cfm?abstract_id=942686.
- Baum, Dan. *Smoke and Mirrors: The War on Drugs and the Politics of Failure*. Boston: Little Brown, 1996.
- Beckett, Katherine. *Making Crime Pay: Law and Order in Contemporary America*. Oxford: Oxford University Press, 1990.
- Carpenter, Ted Galen. *Bad Neighbor Policy* New York: Palgrave MacMillan, 2003.
- Caulkins, Jonathon P. and Peter Reuter. "How Drug Enforcement Affects Drug Prices." *Crime and Justice* 39 (2010): 213-271, <https://www.journals.uchicago.edu/doi/abs/10.1086/652386>.
- Ciccarone, Daniel. "Fentanyl in the U.S. Heroin Supply: A Rapidly Changing Risk Environment." *International Journal of Drug Policy* 46 (2017): 107-111, <https://www.ncbi.nlm.nih.gov/pubmed/28735776>.

- Ciccarone, Daniel, Jeff Ondocsin, and Sarah Mars. "Heroin Uncertainties: Exploring Users' Perceptions of Fentanyl-Adulterated and -Substituted 'Heroin'." *International Journal of Drug Policy* 46 (2017): 146-155, [http://www.ijdp.org/article/S0955-3959\(17\)30167-6/abstract](http://www.ijdp.org/article/S0955-3959(17)30167-6/abstract).
- Cicero, T.J. and M.S. Ellis. "Abuse-Deterrent Formulations and the Prescription Opioid Abuse Epidemic in the United States: Lessons Learned from OxyContin." *Journal of the American Medical Association: Psychiatry* 72, no. 5 (May 2015), <https://www.ncbi.nlm.nih.gov/pubmed/25760692>.
- Cicero, Theodore, et al. "The Changing Face of Heroin Use in the United States: A Retrospective Analysis of the Past 50 Years." *Journal of the American Medical Association: Psychiatry* 71, no. 7 (July 2014): 821-826, <https://www.ncbi.nlm.nih.gov/m/pubmed/24871348/>.
- Cicero, T.J., J.A. Inciardi, and A.J. Munoz. "Trends in Abuse of OxyContin and Other Opioid Analgesics in the United States: 2002-2004." *Journal of Pain* 6, no. 10 (October 2005), <https://www.ncbi.nlm.nih.gov/pubmed/16202959>.
- Corsaro, Nick, Eleazer D. Hunt, Natalie Kroovand Hipple, and Edmund F. McGarrell. Impact of Drug Market Pulling Levers Policing on Neighborhood Violence." *Criminology & Public Policy* 11, no. 2 (May 2, 2012), <https://onlinelibrary.wiley.com/doi/abs/10.1111/j.1745-9133.2012.00798.x>.
- Dart, Richard C. et al. "Trends in Opioid Analgesic Abuse and Mortality in the United States." *New England Journal of Medicine* 372 (January 2015): 241-248, <http://www.nejm.org/doi/full/10.1056/NEJMSa1406143>.
- Dumont, Dora M. et al. "Public Health and the Epidemic of Incarceration." *Annual Review of Public Health* 33 (April 21 2012): 325-339, <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3329888/>.
- Fernandez, William, Holly Hackman, Loreta Mckeown, Teresea Anderson, and Beth Hume. "Trends in Opioid-Related Fatal Overdoses in Massachusetts, 1990-2003." *Journal of Substance Abuse Treatment* 31, (2006): 151-156, <https://www.rand.org/pubs/testimonies/CT469.html>.
- Frank, Richard G. "Addressing the Fentanyl Threat to Public Health." *New England Journal of Medicine*, 376, no. 7 (February 2017): 605-607, <http://www.nejm.org/doi/full/10.1056/NEJMp1615145>.
- Friedmann, Peter D., Christina M. Andrews, and Keith Humphreys. "How ACA Repeal Would Worsen the Opioid Epidemic." *The New England Journal of Medicine* 376, no. 16 (March 9, 2017), <http://www.nejm.org/doi/full/10.1056/NEJMp1700834>.
- Gooberman, Lawrence. *Operation Intercept: The Multiple Consequences of Public Policy*. Elmsford, New York: Pergamon Press Inc., 1974.

- Guy Jr., J.P. et al. "Vital Signs: Opioid Prescribing in the United States, 2006-2015." *Morbidity and Mortality Weekly Report* 66, no. 26 (July 2017): 697-704, <https://www.cdc.gov/mmwr/volumes/66/wr/mm6626a4.htm#suggestedcitation>.
- Inturrisi, Charles. "Clinical Pharmacology of Opioids for Pain." *Clinical Journal of Pain* 4, no. 13 (July 2002): 3-13, <https://www.ncbi.nlm.nih.gov/pubmed/12479250>.
- Jones, C.M. "Heroin Use and Heroin Use Risk Behaviors Among Nonmedical Users of Prescription Opioid Pain Relievers – United States, 2002-2004 and 2008-2010." *Journal of Drug and Alcohol Dependence* 132 (September 2013), <https://www.ncbi.nlm.nih.gov/pubmed/23410617>.
- King, Ryan and Marc Mauer. *The War on Marijuana: The Transformation of the War on Drugs in the 1990s*. New York: Sentencing Project, 2005.
- Kolodny, Andrew et. al. "The Prescription Opioid and Heroin Crisis: A Public Health Approach to an Epidemic of Addiction." *Annual Review of Public Health* 36 (March 2015), https://www.annualreviews.org/doi/full/10.1146/annurev-publhealth-031914-122957?url_ver=Z39.88-2003&rfr_id=ori%3Arid%3Acrossref.org&rfr_dat=cr_pub%3Dpubmed.
- Madden, Gregory J. "Ammunition for Fighting a Demand-Side War on Drugs: A Review of Contingency Management in Substance Abuse Treatment." *Journal of Applied Behavior Analysis* 41, no. 4 (Winter 2008): 646-651, <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2606593/>.
- Mauer, Marc. *Race to Incarcerate*, rev. ed. New York: The New Press, 2006.
- Miller, Lisa L. *The Perils of Federalism: Race, Poverty, and the Politics of Crime Control*. Oxford: Oxford University Press, 2008.
- Murthy, Vivek H. "Ending the Opioid Epidemic – A Call to Action." *The New England Journal of Medicine* 375 (December 22, 2016): <http://www.nejm.org/doi/full/10.1056/NEJMp1612578>.
- Nahin, R.L. "Estimates of Pain Prevalence and Severity in Adults: United States, 2012." *Journal of Pain* 16, no. 8 (August 2015), <https://www.ncbi.nlm.nih.gov/pubmed/26028573>.
- Portenoy R.K. and K.M. Foley. "Chronic Use of Opioid Analgesics in Non-Malignant Pain: A Report of 38 Cases." *Journal of Pain* 25, no. 2 (May 1986), <https://www.ncbi.nlm.nih.gov/pubmed/2873550>.
- Reuter, Peter. "Setting Priorities: Budget and Program Choices for Drug Control." *University of Chicago Legal Forum* 1994, no. 1 (N.d.): 145-173, <http://chicagounbound.uchicago.edu/cgi/viewcontent.cgi?article=1158&context=uclf>.

- Rosenberger, Leif. *America's Drug War Debacle*. Brookfield, VT: Ashgate Publishing Co., 1996.
- Schwartz, Robert et. al. "Opioid Agonist Treatments and Heroin Overdose Deaths in Baltimore, Maryland, 1995-2009." *American Journal of Public Health* 103, no. 5 (May 1, 2013): <http://ajph.aphapublications.org/doi/abs/10.2105/AJPH.2012.301049>.
- Skolnick, Phil. "The Opioid Epidemic: Crisis and Solutions." *Annual Review of Pharmacology and Toxicology* 58 (October 2017): <https://www.annualreviews.org/doi/abs/10.1146/annurev-pharmtox-010617-052534>.
- Straus, Michele M., Udi E. Ghitza, and Betty Tai. "Preventing Deaths from Rising Opioid Overdose in the U.S. – The Promise of Naloxone Antidote in Community-Based Naloxone Take-Home Programs." *Substance Abuse and Rehabilitation* 4 (September 2, 2013): 1-7, <https://www.ncbi.nlm.nih.gov/pubmed/24273417>.
- Quionones, Sam. *Dreamland: The True Tale of America's Opioid Epidemic*. New York: Bloomsbury Press, 2015.
- Upadhyay, J. et al., "Alterations in Brain Structure and Functional Connectivity in Prescription Opioid-Dependent Patients." *NCBI* 133, no. 7 (July 2010), <https://www.ncbi.nlm.nih.gov/pubmed/20558415>.
- Van Zee, Art. "The Promotion and Marketing of OxyContin: Commercial Triumph, Public Health Tragedy." *NCBI* 99, no. 2 (February 2009), <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2622774/>.
- Volkow, Nora et al. "Medication-Assisted Therapies – Tackling the Opioid-Overdose Epidemic." *New England Journal of Medicine* 370 (May 2014), <http://www.nejm.org/doi/full/10.1056/NEJMp1402780>.
- Walley, A.Y. "Opioid Overdose Rates and Implementation of Overdose Education and Nasal Naloxone Distribution in Massachusetts: Interrupted Time Series Analysis." *British Medical Journal* 346 (2013), <https://www.bmj.com/content/346/bmj.f174>.
- Warner M. et al. "Drugs Most Frequently Involved in Drug Overdose Deaths: United States, 2010-2014." *National Vital Statistics Report* 65, no. 10 (December 2016): 1-15, <https://www.ncbi.nlm.nih.gov/pubmed/27996932>.
- Younger, Jared et al. "Prescription Opioid Analgesics Rapidly Change the Human Brain." *Journal of Pain* 152, no. 8 (April 2011), https://www.researchgate.net/publication/51087354_Prescription_opioid_analgesics_rapidly_change_the_human_brain.

Government Agency Websites and Reports

“About Us.” Harm Reduction Coalition. N.d. <http://harmreduction.org/about-us/>.

Ahmad, F.B., L.M. Rossen, M.R. Spencer, M. Warner, and P. Sutton. *Provisional Drug Overdose Death Counts*. National Center for Health Statistics. 2018. <https://www.cdc.gov/nvss/vsrr/drug-overdose-data.html>.

America’s Addiction to Opioids: Heroin and Prescription Drug Abuse: Before the Senate Caucus on International Narcotics Control, United States Senate. 113th Cong. 2014. (statement of Nora D. Volkow, M.D.). <https://www.drugabuse.gov/about-nida/legislative-activities/testimony-to-congress/2016/americas-addiction-to-opioids-heroin-prescription-drug-abuse>.

California Department of Corrections and Rehabilitation. Division of Internal Oversight and Research. Office of Research. *Weekly Report of Population as of Midnight*. May 21, 2018, https://www.cdcr.ca.gov/Reports_Research/Offender_Information_Services_Branch/WeeklyWed/TPOP1A/TPOP1Ad180321.pdf.

Carson, E. Ann. *Prisoners in 2016*. Bureau of Justice Statistics. January 9, 2018. <https://www.bjs.gov/index.cfm?ty=pbdetail&iid=6187>.

Christie, Chris. “The President’s Commission on Combating Drug Addiction and the Opioid Crisis.” The White House. October 2017, https://www.whitehouse.gov/sites/files/images/Final_Report_Draft_11-1-2017.pdf.

“Cost of Drug and Alcohol Rehab.” Addiction Center. N.d. <https://www.addictioncenter.com/rehab-questions/cost-of-drug-and-alcohol-treatment/>.

“DEA Programs: High Intensity Drug Trafficking Areas (HIDTAs).” Drug Enforcement Administration. N.d. <https://www.dea.gov/ops/hidta.shtml>.

Department of Homeland Security. *Budget-in-Brief: Fiscal Year 2017*. Department of Homeland Security. N.d. <https://www.dhs.gov/sites/default/files/publications/FY2017BIB.pdf>.

“Department of Justice Announces Significant Tool in Prosecuting Opioid Traffickers in Emergency Scheduling of All Fentanyl.” Drug Enforcement Administration. November 9, 2017. <https://www.dea.gov/divisions/hq/2017/hq110917.shtml>.

Domestic Council Drug Abuse Task Force. *White Paper on Drug Abuse*. Report to the President. 1975. <https://www.fordlibrarymuseum.gov/library/document/0067/1562951.pdf>.

“Drug Market Intervention.” National Network for Safe Communities at John Jay College. N.d. <https://nnscommunities.org/our-work/strategy/drug-market-intervention>.

“CDC Guidelines for Prescribing Opioids for Chronic Pain – 2016.” Centers for Disease Control and Prevention. March 18, 2016, <https://www.cdc.gov/mmwr/volumes/65/rr/rr6501e1.html>.

“Drug Courts.” U.S. Department of Justice: Office of Justice Programs. May 2017, <https://www.ncjrs.gov/pdffiles1/nij/238527.pdf>.

“Drug Scheduling.” Drug Enforcement Administration. N.d., <https://www.dea.gov/druginfo/ds.shtml>.

“Emerging Drug Threats.” NCSL. June 6, 2017, <http://www.ncsl.org/research/civil-and-criminal-justice/synthetic-drug-threats.aspx>.

Fentanyl: The Next Wave of the Opioid Crisis: Testimony Before the Subcommittee on Oversight and Investigations and Committee on Energy and Commerce, United States House of Representatives. 115th Cong. March 21, 2017. (statement of Kemp L. Chester, Acting Director of National Drug Control Policy). <http://docs.house.gov/meetings/IF/IF02/20170321/105739/HHRG-115-IF02-Wstate-ChesterK-20170321.pdf>.

Florida Association of Counties. *2017-2018 Florida Legislature’s Proposed State Budget – General Overview.* FAC: Florida Association of Counties. N.d. <http://fl-counties.com/2017-2018-florida-legislatures-proposed-state-budget-general-overview>.

Florida Department of Law Enforcement. *Drugs Identified in Deceased Persons by Florida Medical Examiners 2016 Annual Report.* Florida Department of Law Enforcement. November 2016. <https://www.fdle.state.fl.us/MEC/Publications-and-Forms/Documents/Drugs-in-Deceased-Persons/2016-Annual-Drug-Report.aspx>.

Funding Considerations in the Fight Against the Opioid Epidemic: Testimony Before the House of Appropriations Committee, Subcommittee on Labor, Health, and Human Services, Education, and Related Agencies, United States House of Representatives. 115th Cong. 2017. (statement of Rosalie Liccardo Padula, Ph.D.). https://www.rand.org/content/dam/rand/pubs/testimonies/CT400/CT469/RAND_CT469.pdf.

Hedden, Sarah L. et. al. *Behavioral Health Trends in the United States: Results from the 2014 National Survey on Drug Use and Health.* SAMHSA: Center for Behavioral Health Statistics and Quality. September 2015. <https://www.samhsa.gov/data/sites/default/files/NSDUH-FRR1-2014/NSDUH-FRR1-2014.pdf>.

Hedegaard, H., M. Warner, and A.M. Minino. *Drug Overdose Deaths in the United States, 1999-2016: NCHS Data Brief, no. 294.* CDC: Centers for Disease Control and Prevention: National Center for Health Statistics. 2016. <https://www.cdc.gov/drugoverdose/data/statedeaths.html>.

“Home Page.” LEAD: Law Enforcement Assisted Diversion. N.d. <http://leadkingcounty.org>.

“Increases in Drug and Opioid-Involved Overdose Deaths – United States 2010-2015.” Centers for Disease Control and Prevention. December 30, 2016, <https://www.cdc.gov/mmwr/>

volumes/65/wr/mm655051e1.htm?utm_campaign=colorado.ourcommunitynow.com%20website&utm_source=ocn_story&utm_medium=website.

- Kennedy David, and Jonathon Ben-Menachem. "Rutland, Vermont, Case Study: Using DMI to Combat Covert Opioid Markets." *Police Chief Magazine*. March 2018, <https://www.policechiefmagazine.org/rutland-vermont-case-study/?ref=ee82da1da915d3c6f32f7d22f4bfb5el>.
- Masci, David. "\$30 Billion Anti-Crime Bill Heads to Clinton's Desk." *Congressional Quarterly*. August 27, 1994, <https://cqrollcall.com/>.
- "Medicaid's Role in Addressing the Opioid Epidemic." Kaiser Family Foundation. February 27, 2018, <https://www.kff.org/infographic/medicaids-role-in-addressing-opioid-epidemic/>.
- Murphy, Kelly, Melinda Becker, Jeff Locke, Chelsea Kelleher, Jeff McLeod, and Frederick Isasi. "Finding Solutions to the Prescription Opioid and Heroin Crisis: A Road Map for States." National Governors Association. July 2016, <https://www.nga.org/files/live/sites/NGA/files/pdf/2016/1607NGAOpioidRoadMap.pdf>.
- National Association of Counties and National League of Cities. *A Prescription for Action: Local Leadership in Ending the Opioid Crisis*. Opioid Action. N.d. <http://opioidaction.org/report/>.
- "National Heroin Threat Assessment Summary." Drug Enforcement Administration. 2016, https://www.dea.gov/divisions/hq/2016/hq062716_attach.pdf.
- Northern Kentucky Drug Strike Force. N.d. <http://nkdsf.org/index.php/about-nkdsf/history-2/>.
- "The Opioid Addiction Treatment System: Report to the Vermont Legislature." Vermont Department of Health. January 15, 2013, <http://www.leg.state.vt.us/reports/2013ExternalReports/285154.pdf>.
- "Opioid Overdose Crisis." National Institute on Drug Abuse. March 2018, <https://www.drugabuse.gov/drugs-abuse/opioids/opioid-overdose-crisis>.
- "Opioids." National Institute of Drug Abuse. N.d. <https://www.drugabuse.gov/drugs-abuse/opioids>.
- "Opioids." Substance Abuse and Mental Health Services Administration. Last updated February 23, 2016, <https://www.samhsa.gov/atod/opioids>.
- "Overdose Deaths in the United States, 1999-2016." Centers for Disease Control and Prevention. December 2017, <https://www.cdc.gov/nchs/products/databriefs/db294.html>.
- "Palliative Care, Opioid Conversion, Equivalency Table." Stanford School of Medicine. 2018, <https://palliative.stanford.edu/opioid-conversion/>.

“Portuguese Drug Strategy.” European Monitoring Centre for Drugs and Drug Addiction. N.d. http://www.emcdda.europa.eu/system/files/att_119431_EN_Portugal%20Drug%20strategy%201999.pdf.

“Prescribing Policies: States Confront Opioid Epidemic.” NCSL. September 8, 2017, <https://www.ncsl.org/research/health/prescribing-policies-states-confront-opioid-overdose-epidemic.aspx>.

Research on the Use of Misuse of Fentanyl and Other Synthetic Opioids: Before the House Committee on Energy and Commerce, Subcommittee on Oversight and Investigations, United States House of Representatives. 115th Cong. 2017. (statement of Wilson M. Compton, M.D., NIDA Deputy Director). <https://www.drugabuse.gov/about-nida/legislative-activities/testimony-to-congress/2017/research-use-misuse-fentanyl-other-synthetic-opioids>.

Statement Before the House Appropriations Committee, Subcommittee on Commerce, Justice, Science, and Related Agencies, United States House of Representatives. 114th Congr. 2016. (statement of James B. Comey, FBI Director). <https://www.fbi.gov/news/testimony/fbi-budget-request-for-fiscal-year-2017>.

“Summary Offences and the Crown Court: Legal Guidance.” The Crown Prosecution Service. January 27, 2017, www.cps.gov.uk.

United States Department of Health and Human Services. Centers for Disease Control and Prevention. “CDC’s Top Ten: 5 Health Achievements in 2013 and 5 Health Threats in 2014.” *Centers for Disease Control and Prevention*. December 16, 2013. <https://www.cdc.gov/media/releases/2013/p1216-eoy2013.html>.

United States Department of Health and Human Services. Substance Abuse and Mental Health Services Administration. Center for Behavioral Health Statistics and Quality. *Results From the 2013 National Survey on Drug Use and Health: Summary of National Findings.* SAMHSA: Substance Abuse and Mental Health Services Administration. September 2014. <https://www.samhsa.gov/data/sites/default/files/NSDUHresultsPDFWHTML2013/Web/NSDUHresults2013.pdf>.

United States Department of Health and Human Services. Substance Abuse and Mental Health Services Administration. *Results from the 2013 National Survey on Drug Use and Health: Summary of National Findings.* SAMHSA: Substance Abuse and Mental Health Services Administration. 2014. <https://www.samhsa.gov/data/sites/default/files/NSDUHresultsPDFWHTML2013/Web/NSDUHresults2013.pdf>.

United States Department of Justice. Drug Enforcement Administration. *2016 National Drug Threat Assessment Summary.* Drug Enforcement Administration. November 2016. <https://www.dea.gov/resource-center/2016%20NDTA%20Summary.pdf>.

United States Department of Justice. Drug Enforcement Administration. *Counterfeit Prescription*

- Pills Containing Fentanyls: A Global Threat*. Drug Enforcement Administration. July 2016. <https://www.dea.gov/docs/Counterfeit%20Prescription%20Pills.pdf>
- United States Department of Justice. Drug Enforcement Administration. *Fentanyl: A Briefing Guide for First Responders*. Drug Enforcement Administration. June 2017. https://www.dea.gov/druginfo/Fentanyl_BriefingGuideforFirstResponders_June2017.pdf.
- United States Department of Justice. Drug Enforcement Administration. *FY 2017 Budget Request At a Glance*. United States Department of Justice. N.d. <https://www.justice.gov/jmd/file/822096/download>.
- United States Department of Justice. Drug Enforcement Administration. *National Heroin Threat Assessment Summary*. Drug Enforcement Administration. June 2016. https://www.dea.gov/divisions/hq/2016/hq062716_attach.pdf.
- United States Department of Justice. National Drug Intelligence Center. *National Drug Threat Assessment: 2011*. Department of Justice. August 2011. <https://www.justice.gov/archive/ndic/pubs44/44849/44849p.pdf>
- United States General Accounting Office. *Prescription Drugs: OxyContin Abuse and Diversion and Efforts to Address the Problem, Report to Congressional Requesters*. H.R. Rep. 108th 2003. <https://www.gao.gov/new.items/d04110.pdf>.
- United States White House. Executive Office of the President. Council of Economic Advisors. *The Underestimated Cost of the Opioid Epidemic*. The White House. November 2017. <https://www.whitehouse.gov/sites/whitehouse.gov/files/images/The%20Underestimated%20Cost%20of%20the%20Opioid%20Crisis.pdf>.
- United States White House. Executive Office of the President. Office of National Drug Control Policy. *National Drug Control Strategy for 1989*. National Criminal Justice Reference Service. 1989. <https://www.ncjrs.gov/pdffiles1/ondcp/119466.pdf>.
- United States White House. Office of Management of Budget. *The President's Budget*. The White House. N.d. <https://www.whitehouse.gov/omb/budget/>.
- United States White House. Office of the National Drug Control Policy. *National Drug Control Strategy: A Nation Responds to Drug Use*. NCJRS: National Criminal Justice Reference Sample. 1992. <https://www.ncjrs.gov/pdffiles1/ondcp/134372.pdf>.
- Vermont Department of Health. *Drug-Related Fatalities in Vermont*. Vermont Department of Health. January 2018. http://www.healthvermont.gov/sites/default/files/documents/pdf/ADAP_Data_Brief_Drug_Related_Fatalities.pdf.
- Villa, Lauren. "Is Fentanyl More Deadly Than Heroin." Drug Abuse. N.d. <https://drugabuse.com/library/is-fentanyl-more-deadly-than-heroin/>.

“What is Harm Reduction? A Position Statement from Harm Reduction International.” Harm Reduction International. 2018, <https://www.hri.global/what-is-harm-reduction>.

Journalism

Associated Press. “Science Says: Why Are Opioids So Addictive.” *AP News*, May 2, 2017. <https://www.apnews.com/7615878f9f40487593d99f02e68d96ee/Science-Says:-Why-are-opioids-so-addictive?>.

Baldwin, Patricia. “Prosecutors and Health Care Workers Need Tools to Fight Opiate Epidemic.” *The Batesville Herald-Tribune*, August 13, 2017. http://www.batesvilleheraldtribune.com/opinion/prosecutors-and-health-care-workers-need-tools-to-fight-opiate/article_b2ac6cfc-c0e5-5a27-9fb3-94f9bba21177.html.

Bernstein, Lenny. “White House Opioid Commission Calls for Wide-Ranging Changes to Anti-Drug Policies.” *The Washington Post*, November 1, 2017. https://www.washingtonpost.com/news/to-your-health/wp/2017/11/01/white-house-opioid-commission-calls-for-wide-ranging-changes-to-anti-drug-policies/?utm_term=.2a9d664ec469.

Bollinger, Lee C. et al. “Ending the Opioid Crisis: A Practical Guide for State Policymakers.” The National Center on Addiction and Substance Abuse, October 2017. <https://www.centeronaddiction.org/newsroom>.

Brauer, M. Scott. “Inside a Killer Drug Epidemic: A Look at America’s Opioid Crisis.” *The New York Times*, January 6, 2017. <https://www.nytimes.com/2017/01/06/us/opioid-crisis-epidemic.html>.

Buggle, Annabelle. “After 40-Year Fight, Illicit Drug Use at All Time High.” *Huffington Post*, December 6, 2017. https://www.huffingtonpost.com/annabelle-buggle/after-40year-fight-illici_b_3623714.html.

Butterworth, Bob and Simone Marsteller. “Florida in Dire Need of Criminal Justice Reform.” *The Sun Sentinel*, March 10, 2018. <http://www.sun-sentinel.com/opinion/commentary/fl-viewpoint-reform-20160310-story.html>.

Ceneta, Manuel Balce. “President Donald Trump Signs into Law the Bipartisan Interdict Act.” *The Washington Times*, January 10, 2018. https://www.washingtontimes.com/multi-media/image/trump_opioids_36665jpg-071adjpg/.

Davis, Julie Hirschfeld. “Trump Declared Opioid Crisis a ‘Health Emergency’ but Requests No Funds.” *The New York Times*, October 26, 2017. <https://www.nytimes.com/2017/10/26/us/politics/trump-opioid-crisis.html>.

Dickinson, Tim. “Why America Can’t Quit the Drug War.” *Rolling Stone*, May 5, 2016. <https://www.rollingstone.com/politics/news/why-america-cant-quit-the-drug-war-20160505>.

- Ehley Brianna, and Sarah Karlin-Smith. "Kellyanne Conway's 'Opioid Cabinet' Sidelines Drug Czar's Experts." *Politico*, February 6, 2018. <https://www.politico.com/story/2018/02/06/kellyanne-conway-opioid-drug-czar-325457>.
- Evans, Nick. "FL Takes Hard Line on Opioids But Some Question Approach." *Health News Florida*, July 14, 2017. <http://health.wusf.usf.edu/post/fl-takes-hard-line-opioids-some-question-approach#stream/0>.
- Fouriezos, Nick. "As Other States De-Escalate, Florida Declares War on Drugs." *Ozy*, May 19, 2017. <https://www.ozy.com/politics-and-power/as-other-states-de-escalate-florida-declares-war-on-drugs/77358>.
- Gerry, Christopher. "Drugs, Data, and Public Policy: What Can Science Teach Lawmakers About the Opioid Crisis." *Science in the News*, October 25, 2016. <http://sitn.hms.harvard.edu/flash/2016/drugs-data-public-policy-can-science-teach-lawmakers-opioid-crisis/>.
- Glazek, Christopher. "The Secretive Family Making Billions from the Opioid Crisis." *Esquire*, October 16, 2017. <https://www.esquire.com/news-politics/a12775932/sackler-family-oxycotin/>.
- Herd, Timm. "After 100 Years, Does California's Initiative Process Need a Tune-Up." *Ventura County Star*, September 24, 2011. <http://archive.vcstar.com/news/after-100-years-does-californias-initiative-process-need-a-tune-up-ep-364421038-352291341.html/>.
- Hyland, Steven. "The Shifting Terrain of Latin Americana Drug Trafficking." *Origins: Current Events in Historical Perspective*, September 2011. <http://origins.osu.edu/article/shifting-terrain-latin-american-drug-trafficking/page/0/1>.
- "Inside the Opioid Epidemic: Deaths From the Drugs Say More About Markets than About White Despair." *The Economist*, May 11, 2017. <https://www.economist.com/news/united-states/21721960-deaths-drugs-say-more-about-markets-about-white-despair-inside-opioid>.
- Katel Peter. "Opioid Crisis: Can Recent Reforms Curb the Epidemic." *CQ Researcher*, October 7, 2016. <http://library.cqpress.com/cqresearcher/document.php?id=cqresrre2016100700>.
- Levey, Noam M. "Obamacare Has Led to Health Coverage for Millions More People." *The Los Angeles Times*, March 30, 2014. <http://articles.latimes.com/2014/mar/30/nation/la-na-obamacare-uninsured-national-20140331>.
- Lopez, German. "A Member of Trump's Opioid Commission Calls its Work 'A Charade'." *Vox*, January 23, 2018. <https://www.vox.com/policy-and-politics/2018/1/23/16923188/trump-opioid-commission-kennedy-sham-charade>.

- Lopez, German. "Congress's Omnibus Bill Adds \$3.3 Billion to Fight the Opioid Crisis. It's Not Enough." *Vox*, March 22, 2018. <https://www.vox.com/policy-and-politics/2018/3/22/17150294/congress-omnibus-bill-opioid-epidemic>.
- Lopez, German. "How Obama Quietly Reshaped America's War on Drugs." *Vox*, January 19, 2017. <https://www.vox.com/identities/2016/12/19/13903532/obama-war-on-drugs-legacy>.
- Lopez, German. "I Looked for a State That's Taken the Opioid Epidemic Seriously. I Found Vermont." *Vox*, October 31, 2017. <https://www.vox.com/policy-and-politics/2017/10/30/16339672/opioid-epidemic-vermont-hub-spoke>.
- Mccausland Phil and Connor Tracy. "OxyContin Maker Purdue to Stop Promoting Opioids in Light of Epidemic." *NBC*, February 10, 2018. <https://www.nbcnews.com/storyline/americas-heroin-epidemic/oxycontin-maker-purdue-stop-promoting-opioids-light-epidemic-n846726>.
- Merica, Dan. "Trump to Declare National Emergency on Opioids Months After Initial Promise." *CNN*, October 16, 2017. <https://www.cnn.com/2017/10/16/politics/donald-trump-opioids-national-emergency/index.html>.
- Mitchell, Jerry. "Obama Gets D-minus, Trump an F for Work on Opioid Epidemic, Expert Says." *The Clarion Ledger*, February 9, 2018. <https://www.clarionledger.com/story/news/2018/02/09/obama-gets-d-trump-f-work-opioid-epidemic-expert-says/1043205001/>.
- Noguchi, Yuki. "State to Investigate Pharmaceutical Companies Over Opioids." *National Public Radio*, September 19, 2017. <https://www.npr.org/sections/thetwo-way/2017/09/19/552135830/41-states-to-investigate-pharmaceutical-companies-over-opioids>.
- O'Harrow Jr., Robert. "Meet the 24-year-old Trump Campaign Worker Appointed to Help Lead the Government's Drug Policy Office." *The Washington Post*, January 14, 2018. https://www.washingtonpost.com/investigations/meet-the-24-year-old-trump-campaign-worker-appointed-to-help-lead-the-governments-drug-policy-office/2018/01/13/abdada34-f64e-11e7-91af-31ac729add94_story.html?utm_term=.3807cd7b02df.
- Reuter, Peter. "Limits of Supply-Side Drug Control." *RAND Corporation*, 2001. <http://faculty.publicpolicy.umd.edu/sites/default/files/reuter/files/milken.pdf>.
- Schwartz, Alan. "Michael Botticelli is a Drug Czar Who Knows Addiction Firsthand." *The New York Times*, April 25, 2015. https://www.nytimes.com/2015/04/26/us/michael-botticelli-is-a-drug-czar-who-knows-addiction-firsthand.html?_r=1.
- Sederer, Lloyd. "A Blind Eye to Addiction: Drug and Alcohol Addicts in the U.S. Aren't Getting the Comprehensive Treatment They Deserve." *U.S. News*, June 1, 2015. <https://www.usnews.com/opinion/blogs/policy-dose/2015/06/01/america-is-neglecting-its-addiction-problem>.

- Sessions, Jeff. "Being Soft on Sentencing Means More Violent Crime, It's Time to Get Tough Again." *The Washington Post*. June 16, 2017, https://www.washingtonpost.com/opinions/jeff-sessions-being-soft-on-sentencing-means-more-violent-crime-its-time-to-get-tough-again/2017/06/16/618ef1fe-4a19-11e7-9669-250d0b15f83b_story.html?utm_term=.c9d9b4ac9131.
- "State Reforms to Mandatory Minimum Sentencing Laws." Families Against Mandatory Minimums, November, 2017. <http://famm.org/wp-content/uploads/2017/11/Chart-STATE-REFORMS-TO-MANDATORY-MINIMUM-SENTENCING-LAWS-Nov-2017.pdf>.
- Stolberg, Sheryl Gay and Jeff Gerth. "High-Tech Stealth Being Used to Sway Doctor Prescriptions." *The New York Times*, November 16, 2000. <http://www.nytimes.com/2000/11/16/us/high-tech-stealth-being-used-to-sway-doctor-prescriptions.html>.
- "Thirty Years of America's Drug War: A Chronology." *PBS*, 2014. <https://www.pbs.org/wgbh/pages/frontline/shows/drugs/cron/>.
- Townes, Carimah. "Indiana Prosecutors Want to Incarcerate the Opioid Crisis Away." *In Justice Today*, August 15, 2017. <https://injusticetoday.com/indiana-prosecutors-want-to-incarcerate-the-opioid-crisis-away-62ec0399a3>.
- "Trump Says He Will Focus On Opioid Law Enforcement, Not Treatment." *National Public Radio*, February 7, 2018. <https://www.npr.org/sections/health-shots/2018/02/07/584059938/trump-says-he-will-focus-on-opioid-law-enforcement-not-treatment>.
- Vestal, Christine. "As Fentanyl Spreads, States Step Up Responses." *The Pew Charitable Trusts*, May 8, 2017. <http://www.pewtrusts.org/en/research-and-and-evaluation>.
- Virtanen, Michael. "West Virginia to Spend Opioid Lawsuit Funds on Addiction Treatment Facilities." *Insurance Journal*, April 13, 2017. <https://www.insurancejournal.com/news/southeast/2017/04/13/447733.htm>.
- Webb, Gary. "Driving While Black." *Esquire*, April 1, 1999. <http://www.esquire.com/news-politics/a1223/driving-while-black-0499/>.
- Zezenia, Katie. "Counterfeit Opioid Pills are Tricking Users." *The Washington Post*, November 19, 2017. https://www.washingtonpost.com/national/counterfeit-opioid-pills-are-tricking-users--sometimes-with-lethal-results/2017/11/19/d34edb14-be4b-11e7-8444-a0d4f04b89eb_story.html?utm_term=.2e853400da8e.
- Zezenia, Katie. "With Drug Overdoses Soaring, States Limit the Length of Painkiller Prescriptions." *The Washington Post*, August 9, 2017. https://www.washingtonpost.com/politics/with-drug-overdoses-soaring-states-limit-the-length-of-painkiller-prescriptions/2017/08/09/4d5d7e0c-7d0f-11e7-83c7-5bd5460f0d7e_story.html?utm_term=.f1ac23950f7e.

Other

Campbell, J.N. “American Pain Society Presidential Address.” (lecture, APS, Pain Forum, 1996).

“Epidemic.” Def. 1. *Merriam-Webster Dictionary*. Merriam-Webster, accessed March 2018. <https://www.merriam-webster.com/dictionary/epidemic>.

“Interdiction.” Def. 1, *The Free Dictionary*. accessed April 16, 2018. <https://www.thefreedictionary.com/drug+interdiction>.

“Opiophobia.” Def. 1. *Pain & Policy Studies Group*,. University of Wisconsin-Madison, accessed March 2018. <http://www.painpolicy.wisc.edu/glossary/opiophobia>.