THE NEW FRONT OF AMERICA’S WAR ON DRUGS: AN EXPLORATION OF THE RISE IN PRESCRIPTION NARCOTIC MEDICATION, THE PROBLEMS ASSOCIATED WITH THIS INCREASE, AND POSSIBLE POLICY RESPONSES TO THIS PROBLEM

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Introduction

The inspiration for this research paper came as a result of my own experiences during routine medical visits and through the course of my work as a probation officer. The following case studies are compilations of actual events that have occurred. All names have been changed to protect the identities of those involved, and any similarities of names and situations are merely coincidental.

CASE 1: Suzie Johnson, a young female in her early 20s, arrived at my office and inquired about how to obtain birth control pills, given that she did not have medical insurance or Medicaid. Suzie indicated that she was able to see a doctor at the local community health clinic, but was informed that before she could actually get a prescription for birth control pills, she would need to schedule a couple of routine gynecological exams. She did not follow through because she could not afford the cost. Though this clinic will accept indigent patients, all patients are expected to pay something, according to a sliding-scale. There are patient and prescription assistance programs, but the process to enroll is lengthy and time consuming, assuming one is even eligible. This difficulty in obtaining birth control pills (pills that at least one could argue might benefit society more than it hurts) is heavily contrasted by numerous stories told to me by recovering addicts about the relative ease in obtaining narcotic painkillers.

CASE 2: John Smith, a young man in his late teens, began using hydrocodone pills after a sports related injury. At the beginning, he would obtain his scripts legitimately from his family doctor. But overtime, his body developed a tolerance to the drug and he needed more of the drug to relieve his pain. It got to a point where his legitimate one month script would only last him a
couple of days; therefore he sought other avenues to supplement his addiction. Sometimes he would buy pills from dealers on the streets, but more often than not he would engage in the practices well known on the streets as “doctor shopping” and “pharmacy hopping.” John knew that he could only legally obtain one hydrocodone script at a time from his family doctor, so he would “doctor shop” and find other doctors that would write him the scripts he wanted/needed, while at the same time, failing to disclose the narcotic scripts written by his family doctor. John also knew that if he tried to fill too many hydrocodone scripts at any given pharmacy, he would call attention to himself and the attention of law-enforcement. Consequently, he would “hop” from pharmacy to pharmacy to fill the scripts he obtained from various doctors. Eventually, however, these practices caught up with him and he was arrested and convicted for engaging in these practices.

CASE 3: Amy Jones is a woman in her mid-40s, who has been using hydrocodone pills, oxycodone pills, and fentanyl patches for approximately five years. Amy began using these drugs after sustaining back and neck injuries in a car crash. At first Amy would obtain these scripts from her family doctor, but after no reported improvement with her injuries and her continuous reports of pain, her family doctor referred her to a neurological specialist. This neurology office had two practicing medical doctors and one nurse practitioner. After performing routine examinations, the neurologist decided to continue Amy on her previous prescriptions for hydrocodone, oxycodone, and fentanyl patches, along with a muscle relaxer and a drug to relieve nerve pain. Over time, however, Amy developed a tolerance to these drugs and soon needed more than the prescribed amount to relieve her pain. Rather than seeking her scripts from different doctors in different offices, Amy would merely schedule weekly visits at this neurological practice, each visit seeing a different practitioner. For example, during week one, she would see Doctor #1; the second week, she would see the Nurse Practitioner; the third week, she would see Doctor #2. Then she would repeat the cycle. During each visit, she would obtain a new script for
one or more of her painkillers. In other words, in the course of three visits, she managed to obtain a three month supply of narcotics. This practice went undetected for several months. It was later learned, that there was only one medical file/chart per patient and all prescribing practitioners had access to the same chart and the notes of the other practitioners. Though Amy’s practice resembles the illegal practice of “doctor shopping” (which under Indiana Statute would fall under the category of Obtaining a Controlled Substance of Fraud or Deceit), it would not be considered a crime because she is using the same medical provider. Rather, this would be considered gross negligence on the part of the prescribing practitioners at the least, if not more, given that a reasonable person could assume that it is the duty of the practitioners to read patient files, consult with each other, and put a stop to drug seeking behaviors engaged in by patients such as Amy.

When the practitioners were asked as to how Amy could obtain the quantity of scripts as she did, the only explanation offered was oversight and time restraints due to the volume of patients seen per day.

**CASE 4:** Joseph Robertson is a man in his late 30s. Joseph has been using oxycodone pills for several years. His oxycodone use began at a party when a friend suggested he try the drug; he has been addicted to it ever since. Joseph would primarily buy oxycodone pills off dealers in the streets, but would also legitimately obtain scripts from his primary physician, citing chronic back pain. In actuality, Joseph did not have a back injury, but knew back pain is a hard diagnosis for physicians to refute, even though all examinations and tests did not reveal an injury or reason for such pain. After his appetite for the drug surpassed the quantity he could obtain from a legitimate script, Joseph attempted to alter a script by changing the quantity of refills from zero refills to one refill. What Joseph did not realize is that oxycodone is a Schedule II controlled substance and cannot be written for refills; rather patients must return for an office visit before another script can be written. Consequently, Joseph was caught by law-enforcement when he attempted to pass the altered script at the pharmacy.
CASE 5: Mary Simmons is a registered nurse in her mid-30s and has been working as a nurse for several years. As a nurse, Mary had access to the blank prescription pads and also had the authority to call in scripts to the local pharmacies. While Mary herself was not a drug user, she had a friend that was addicted to painkillers. Mary’s friend knew that Mary had access to the prescription pads and began asking her to help obtain painkillers. In exchange, this friend would pay her in cash. Though Mary initially declined her friend’s requests, after a while of feeling pressured and a sense of obligation to help her friend she eventually gave in; not to mention, she was a single mother of two children and could benefit from the extra cash. Mary would alternate between filling out the blank (but pre-signed) orders to give to her friend and calling in prescriptions to the local pharmacies for her friend to pick-up. This went on for several months. Eventually, however, Mary’s friend was caught by law-enforcement and turned Mary in as the person providing the scripts.

CASE 6: Fred Stevens is a man in his early 40s. Fred has been a construction worker for more than twenty years, and has been using opiates for over a decade after suffering a back injury on the job. Though Fred has used a variety of opiates over the years, his drug of choice is morphine. But, because many doctors will not continuously prescribe morphine to patients outside hospital settings (preferring to use other opiates such as hydrocodone, oxycodone, etc.), combined with the fact that Fred does not have medical insurance or Medicaid, Fred would frequent the local emergency rooms, seeking treatment for serious self-inflicted injuries in order to obtain morphine shots and scripts for other opiates to fill after he leaves the hospital. Fred eventually was caught by law-enforcement for “doctor shopping” and admitted that he would inflict injuries upon himself such as: drilling a hole in his hand with a power drill, jumping out of a moving car, and falling down flights of stairs, just to obtain painkillers. Obviously, Fred would not tell the emergency room staff or doctors that his injuries were self-inflicted; rather he would
pass them off as “accidents,” and take advantage of the doctor’s position and oath to treat injuries and to relieve pain.

CASE 7: Jane Hill is a woman in her late 20s. She is a mother of two young children who were taken by Child Protective Services and placed in foster care after she was arrested for child neglect. Jane had been an honor roll student in high school and had several swimming scholarships to Division I and II schools. Jane, however, got sucked into the party lifestyle and before she knew it, she was addicted to opiate painkillers. Eventually, one thing led to another, and very quickly she became a heroin addict. First, she would only occasionally inhale powdered heroin through her nose (also known as “snorting”), but after her tolerance grew, she began administering heroin by using a needle and shooting the heroin, subcutaneously, or directly under the skin. This is referred to as “popping.” Ultimately, however, she began shooting heroin intravenously (also known as “shooting up”), or directly into her veins on a regular basis. As a side note, many heroin addicts believe that subcutaneous administration is less dangerous than intravenous use because there is less of a chance in overdosing; however anytime an addict administers illicit drugs through a needle, especially powerful narcotics, there is always a risk in overdose or death. To continue, Jane’s life revolved around one thing and one thing only: getting high. When she was not using heroin, she was constantly trying to find ways to support her habit and once she obtained the money she needed, she was constantly searching for a supply of the drug. At the height of her use, Jane was administering heroin between five and seven times a day. To support her habit, Jane would prostitute herself, steal items to pawn at local pawn shops, and when she became utterly desperate, Jane would prostitute her own children in exchange for money or drugs. Though this seems like an extreme and unbelievable decision for a mother to make, the reader must understand that addiction is so powerful that everything: including common sense, conscience, and even parental instinct is hijacked. Addicts engaged in active addiction (those actively using drugs) often have no concept or care about the hurt or harm caused
to others, including their own innocent children. In any event, after Jane’s children were taken by Child Protective Services, Jane decided that she wanted to get clean and sober. She went to a doctor in hopes of being put on a drug such as Suboxone or Methadone to help wean her off of the opiates. This particular doctor, however, did not believe in the use of these medications, believing that a patient would only be substituting one addiction for another. So, instead of writing a prescription for drugs, the doctor consulted with Jane and explained how and where Jane could seek drug counseling and treatment, even taking the time to write down the names and numbers of local treatment facilities. Unfortunately, the doctor’s compassion was short-lived. Ironically, the scrap piece of paper given to Jane was not a “scrap” piece of paper at all; rather it was a blank, pre-signed prescription order. Not realizing what he was doing, the doctor had written the treatment information on the back of a blank prescription, which Jane in turn forged in an attempt to obtain Methadone pills. Luckily, she was caught at the pharmacy trying to pass the forged script.

CASE 8: Recently I sought medical treatment for a routine sinus infection at a local MedCheck. Every year, it seems, I get the same type of infection, which is usually cured after one round of antibiotics. Obviously, routine medical procedures require an office visit prior to obtaining a script for antibiotics, but I was surprised at the number of hoops I had to jump through, the questions I had to answer, and the exam I had to endure just to acquire a five day supply of antibiotics with no refills. Interestingly, before beginning the exam and questioning pertaining to my current symptoms, the nurse indicated that she needed to ask me a few preliminary questions; questions, she said, that are asked of all patients regardless of the purpose in their visit. The first question was, “Do you have any pain?” The nurse must have sensed my confusion and quickly added, “I’m not asking about pain associated with your current symptoms, just pain in general.” Though it is true that I suffer from chronic pain associated with sports related injuries, I responded by saying, “No.” She replied that had I been in pain, the doctor
would have been willing to write a script to ease any discomfort. Before she left the room, I remarked, “It seems to me that it is much harder to obtain a script for antibiotics than it is to obtain narcotic painkillers.” She responded, “Unfortunately, I can’t disagree with you. You are absolutely right, and it shouldn’t be like that.” It is very reasonable to assume that a patient should be subjected to an office visit and examination before receiving any type of prescription medication. However, it is very disconcerting to hear medical personnel echo the recent phenomenon of seemingly lax prescription writing practices and an increase in narcotic prescriptions.

The case studies listed above are only a minute fraction of the endless stories encountered by members of the medical community and the criminal justice system. On one level, the stories presented in the case studies above are repetitive: they are all about drug addicts seeking drugs (with the exception of the first and last). But upon further examination, it becomes apparent that while the underlying drug seeking behavior is the same, the methods by which addicts attempt to circumvent the rules and regulations enacted by the government to control the supply of prescription drugs, is different. Each case study reveals a different aspect of circumvention that needs to be addressed in order to lessen and control the availability of narcotic painkillers.

This paper will explore the apparent increase in the prescription of narcotic painkillers and the coinciding increase in the addiction rate of narcotic painkillers in the last twenty years. Furthermore, it will address many of the problems encountered in the case studies, and possible solutions to these problems. It will begin with an explanation and definition of painkillers, followed by a discussion of the scheduling of drugs and a history of the Controlled Substances Act. The literature review section will present research and studies to support the theory that there has in fact been a substantial increase in the prescription rate of narcotic painkillers along with an increase of the addiction rates as well. The literature review section will also attempt to answer
the question(s) as to why such an increase has occurred. The last section will set forth ideas and practices that could help to diminish this problem.
Chapter 1: Opium, Semi-synthetic, and Synthetic Opioids

Opium poppy is perhaps the earliest medicinal plant known to mankind. Although the exact time and place of discovery is not known, most scientists and historians agree it dates back at least 4,000 years (Kapoor, 1995). Opium is the dried form of the sticky, brown gum found inside the seed capsule of the poppy plant, and its major active ingredient is a white crystalline powder known as morphine. Morphine is one of the most effective, but highly addictive pain relievers, and it is used to treat moderate to extreme pain. Traditionally, morphine was only used intravenously, but today it is sold in a variety of forms such as oral solutions, tablets, capsules, suppositories, and injections. In the United States, only a small percentage of morphine obtained from opium is used directly. The majority is converted to morphine, codeine, thebaine, and other opiate or synthetic derivatives for standard usage (DEA, 2010); these are known as opioids, or prescription narcotics. Today, Afghanistan produces about 95% of the world’s heroin supply (Risen, 2008), and over 92% of the world’s opium supply (Risen, 2007), a majority of which is trafficked out of the country and exported around the world for sale. Interestingly, however, according to a recent study, Americans consume over 80% percent of the global supply of opioids (Manchikanti, 2007).

Semi-synthetic opioids are drugs synthesized from the naturally occurring opium products such as morphine or codeine; these include heroin, oxycodone, hydrocodone, and hydromorphone (DEA, 2011). Heroin is a drug commercially produced from morphine and is arguably one of the worst drugs in the legal or illegal drug market today, and is one of the most rapidly acting of the opiates, making it one of the most widely abused. It is typically sold as
a white or brownish powder or as a black sticky substance known as “black tar” heroin. Although this drug was widely used in medicine during the early 1900s, today it is an illicit substance with no known medical usage in the United States. Heroin can be smoked and snorted, but the most popular method of use is injection (intravenously). With injection, the user can feel the effects of the drug within a matter of seconds, as opposed to several minutes with other methods. Injection, however, poses further health consequences because of the possible transmission of diseases such as HIV and AIDS, which is commonly spread by the sharing of needles and other injection tools.

The effects of morphine and heroin are similar because heroin is quickly converted into morphine after entering the bloodstream; but, for users, heroin seems to be a more powerful drug. This is the result of what is called the “blood-brain barrier” (Kaplan, 1983), a group of mechanisms that prevents many of the contents of the bloodstream from coming in contact with the brain. When morphine enters the bloodstream, only a very little amount of the drug is allowed to reach the brain; but, heroin can cross the blood-brain barrier more easily. If it is injected, some of the heroin reaches the brain before it is converted into morphine, creating an extremely powerful effect (Kaplan, 1983). Because opiate drugs are physiologically addicting, users will experience withdrawal symptoms when usage stops. Depending on the severity of the addiction, these symptoms can occur in as early as a few hours after the last administration and often require drugs such as Methadone to counteract their effects.

Heroin has long been sought after by drug users because of its fast-acting properties, but today many addicts are chasing their “high” from other semi-synthetic opioids such as hydrocodone, oxycodone, and hydromorphone; ones that often mimic the effects of heroin, and sometimes produce an even greater “high.” The difference is these drugs are legal and easily obtained from any physician willing to write such scripts. Semi-synthetic opioids all have analgesic pain relieving properties and/or can suppress a cough. The most popular and most widely prescribed opioid in America is Hydrocodone, with more than 139 million prescriptions
dispensed for hydrocodone-containing products in 2010 (DEA/OD/ODE, 2011). This equates to the consumption of 99% of the global supply of hydrocodone (Manchikanti, MD, 2007). There are several hundred hydrocodone products on the market today, all of which are combination products (DEA, 2011), meaning the hydrocodone is mixed with another drug such as acetaminophen. Hydromorphone is similar to hydrocodone and oxycodone, but has two to eight times the analgesic potency of morphine; however its effects do not last as long as morphine and can be more sedating (DEA, 2011). Oxycodone is synthesized from thebaine. It is highly addictive and commonly abused by drug addicts. Oxycodone is sold in different milligram tablets in its own form and it is also sold as a combination product (DEA, 2011).

Another form of narcotic analgesics is synthetic opioids. Synthetic narcotics are drugs that are produced entirely in a lab and not synthesized from the naturally occurring opium derivatives. The most common synthetic opiates are meperidine, fentanyl, and methadone (DEA, 2011). Meperidine is a strong drug that is commonly used in pre-anesthesia and surgical procedures. But perhaps the most dangerous drug in the legal or illegal drug market is fentanyl. Fentanyl has an analgesic property that is between 80-10,000 times that of morphine. It is used in both human and veterinary medicine for both chronic, unmanageable pain and anesthesia. Interestingly, the biological effects of fentanyl are indistinguishable from that of heroin, the only difference being that it is hundreds of times stronger and more potent (DEA, 2011); making it all the more dangerous to use.

All narcotic analgesics, whether pure opium, semi-synthetic, or synthetic, are highly addictive and all have the potential for abuse if not properly monitored by a qualified physician. Unfortunately, even under close monitoring, a patient taking opioids can become physiologically and psychologically dependent, meaning users will experience withdrawal symptoms when usage stops. Depending on the severity of the addiction, these symptoms can occur in as early as a few hours after the last administration. To combat these symptoms patients are
often given drugs such as methadone or buprenorphine. Methadone is a synthetic opioid that was first synthesized as an analgesic. Today, however, it is primarily used as in the treatment of narcotic addiction to help combat the symptoms of withdrawal.

Buprenorphine is a semi-synthetic narcotic, and like oxycodone it is synthesized from thebaine. Buprenorphine is sold in its original form (as Subutex) and it is also sold as a combination product, combining buprenorphine and naloxone (called Suboxone). Suboxone and Subutex are the only two buprenorphine products approved by the Food and Drug Administration to assist in the treatment of opioid treatment (FDA-20/732). Suboxone is more preferred of the two, because of the presence of naloxone, which is an opioid antagonist.

Although methadone and buprenorphine are helpful tools to assist patients in withdrawing from opioids, they can also be very dangerous if the patient is not properly supervised by a qualified physician. Because both drugs are opioids (methadone being synthetic, and buprenorphine being semi-synthetic) they too can be addictive. In fact, both drugs are often misused by addicts, who will intentionally use more than directed, combine them with other drugs such as benzodiazepines, or ingest them in a non-approved method such as intravenous administration (FDA-20/732). Not only can addicts who abuse these drugs become addicted to them, these drugs can also cause death.
Chapter 2: Controlled Substances Act & Scheduling of Controlled Substances

The ‘war on drugs’ began as early as the late 1960s, when President Richard Nixon cited drug abuse as a “serious national threat” and insisted that anti-drug policies be enacted at the state and national level in an attempt to eradicate drug abuse (NPR, 2007). By 1971, Nixon called drug abuse “public enemy number one” and officially declared what became known as the ‘war on drugs’ (NPR, 2007). However, national policy makers and law-enforcement officials quickly recognized that ‘illegal’ drugs were not the only drugs being abused; rather prescription medication was a major concern as well. Consequently, in 1970 Congress passed the Controlled Substances Act (Title 21, Chapter 13, and Subchapter 1). In this legislation, Congress acknowledged that while some of the drugs have no known medical use, the majority of the drugs in fact do, but all have the potential for abuse; therefore limited access and control over these drugs is necessary in order to curb their misuse. The section of this Act that most directly bears on this research deals specifically with the scheduling and classification of drugs that have been labeled as controlled substances.

Drugs classified as controlled substances under this act are divided into five schedules: Schedule I-V. Schedule I controlled substances are substances that are not recognized as having accepted medical use in the United States therefore cannot be prescribed, possessed, dispensed, or sold. Of the opioids discussed in the first chapter, heroin is the only one that would fall into this category. Schedule II controlled substances are substances that have been determined to “have a high potential for abuse which may lead to severe physical or psychological dependence”
From opioids discussed in chapter one, opium, morphine, hydromorphone, methadone, oxycodone, meperidine, and fentanyl would fall under this category. Scripts for schedule II drugs cannot be written for refills, which require patients to return to the prescribing provider each time a script runs out or expires. Furthermore, while many states, pharmacies, and prescribing physicians limit a script to a thirty day supply, under the Controlled Substances Act, there is no federal limit restricting the quantity of drug dispensed by a written script. However, the prescription must be consistent with a legitimate medical purpose (DOJ, 2010).

Schedule III controlled substances, “have a potential for abuse less than substances in schedule I and II, and abuse may lead to moderate or low physical or psychological dependence” (DOJ, 2010). Opioids discussed in chapter one that would fall into this category include hydrocodone products containing less than 15mg of hydrocodone per dose or less than 90 milligrams of codeine per dose (DOJ, 2010) and buprenorphine products. Buprenorphine products are often prescribed to opiate addicts to treat opiate addiction, and the hydrocodone products falling under this schedule are the primary hydrocodone products prescribed to patients on a regular basis for pain relief. Schedule III substances can be written for refill if authorized by the medical provider, but the refills are limited to a maximum of five refills within a six month period. After the five refills have been used or the original script exceeds six months, patients must return to the prescribing physician to obtain a new script (DOJ, 2010).

Schedule IV controlled substances “have a low potential for abuse relative to substances in schedule III” (DOJ, 2010). Few opioids fall into this category, the main one being propoxyphene, commonly sold under the brand name Darvocet. Schedule V controlled substances “have a low potential for abuse relative to substances in schedule IV and consist primarily of preparations containing limited quantities of certain narcotics” (DOJ, 2010). The most commonly prescribed narcotic in this category would be cough suppressant syrup containing a limited
quantity of codeine. Schedule IV controlled substances follow the same refill guidelines as schedule III substances, and refills for schedule V are not limited.

One crucial observation made about the scheduling of controlled substances specifically pertaining to opioid medication is the distinction made between a ‘high potential’ ‘moderate potential’ and ‘low potential’ for psychological and physical dependence among the wide spectrum of opioids. This is very important because this distinction inherently implies that some opioids are less addictive and therefore less dangerous than others. Interestingly, however, according to the Center for Disease Control and Prevention (2011), between 1999 and 2008, overdose deaths resulting from the use of opioid medication has increased. In fact, in 2008 alone, there were approximately 36,450 drug overdose deaths in the United States, with approximately 20,044 of those deaths resulting from prescription medication. Of the prescription deaths reported, opioids contributed to approximately 14,800, or 73.8 percent of them (CDC, 2011). These prescription overdose figures are staggering given that the leading cause of injury deaths in the United States result from car crashes, which totaled approximately 39,973 in 2008 (CDC, 2011). But not only have the overdose rates increased, but the sales/distribution of opioids have increased as well, and there seems to be a strong correlation between an increased rate in opioid sales and the overdose rates resulting from opioid medication (CDC, 2011).

In 2010, approximately 4.8 percent of the United States population twelve years of age and older reported abusing opioid medication (CDC, 2011). Furthermore, according to the 2009 National Survey on Drug Use and Health: Volume I Summary of National Findings, among persons twelve years and older who admitted to abusing prescription medication, 55.3 percent admitted to getting the medication from a family member or friend, 17.6 reported that they got the medication from one physician, and only 4.8 percent obtained the medication from a stranger or a drug dealer. Of the 55.3 percent of those who obtained their medication from a family member or friend, 80 percent claimed that the supplying family member or friend received their opioid script
from only one medical provider (SAMHA, 2010). This is very vital information because the data clearly shows that the increased supply of opioid medication, increased opioid abuse rates, and increased overdose rates are: (a) interrelated; and (b) culpability can be attributed to medical providers who seem to be over prescribing opioid medications. This contrasts the attribution of blame for supply rates and abuse of ‘illegal’ substances such as cocaine, marijuana, and heroin which can often be ascribed to foreign suppliers whose supplies are regularly trafficked illegally into the country for sale. This means that in order to reduce or curb the abuse of opioid medications (or any prescription medication for that matter), governmental legislation and regulation is essential.

As discussed earlier in this paper, according to a recent study conducted by the National Institute on Drug Abuse, between 1991 and 2010 (2011), opioid analgesic prescriptions jumped from approximately 30 million prescriptions per year to more than 180 million prescriptions per year. Additionally, the most popular and most widely prescribed opioid in America is hydrocodone, with more than 139 million prescriptions dispensed for hydrocodone-containing products in 2010 (DEA/OD/ODE, 2011), equating to the consumption of 99 percent of the global supply of hydrocodone (Manchikanti, 2007). Based on these figures alone, coupled with the above statistics regarding opioid abuse, one could easily conclude that hydrocodone is one of the most, if not the most, widely abused opioid on the drug market. Interestingly, however, as reflected in the drug scheduling class of the Controlled Substances Act, hydrocodone products (at least the hydrocodone products regularly prescribed for common pain relief) fall under the schedule III category, which means a lower potential for abuse than a majority of other opioids on the market, and when abused, abuse leading only to moderate or low physical or psychological dependence.

One very logical explanation to the abundance of hydrocodone scripts compared to other opioid medication could be the simple fact that being a schedule III controlled substance,
hydrocodone is the strongest opioid analgesic that can be prescribed with the largest refill capability available. This means that medical providers can easily and conveniently treat patients’ pain without causing patients undue hardship and financial burdens resulting from frequent (usually monthly) office visits to refill their prescriptions, as required for schedule II drugs. In addition, because hydrocodone falls under the schedule III drug class, meaning that it has a lower potential for abuse, and if abuse occurs, there is only a low to moderate chance of physical or psychological dependence, physicians perhaps feel safer prescribing hydrocodone products, believing that dependence is not very likely for most patients. After all, assuming that the majority of medical providers have good intentions and the best interest of patients at heart, it would be hard to believe that providers would continue to write such a large quantity of scripts if they knew for a fact, that dependence would occur in the majority of patients. But perhaps the drug classification schedules provide a false sense of security for medical providers, who maybe lack training and experience dealing with opiate addicts and the nature of addiction. Because hydrocodone medication can be refilled up to five times in six months with no limit to the quantity of medication dispensed per script, it is not too hard to see how patients, who begin by following their doctor’s orders and taking a legitimate prescription as prescribed, can eventually become dependent and/or addicted to the medication, quickly requiring more of the medication than allowed for by the script to relieve pain.

Another fact to consider is that, as with all prescription medication, it is impossible for a medical provider to predict how a patient might react to any given drug. In other words, if two people were prescribed the same dose of the same opioid medication and both took the medication as prescribed; and therefore have the same level of opioid medication in their systems, it is very possible that one person could experience symptoms of impairment while the other does not and functions on a normal level. This is because it is virtually impossible to discern, or quantify levels of impairment, as everyone’s body metabolizes drugs at a different rate (Kerrigan,
With alcohol, intoxication levels have been more easily established, hence the determination of the ‘legal limit.’ But even so, it is possible for a person to technically be well under the legal limit of alcohol and still experience the effects of intoxication. Prescription medications are not much different. Even if patients only have a therapeutic level of an opioid in their system, they can still experience symptoms and show visible signs of intoxication. It is this intoxicated state that often leads patients or abusers to become opioid addicts. The user is pleased by the feeling of intoxication (and perhaps early on, the analgesic effect as well), therefore continues to use the drug to achieve the ‘high.’ A consistent and repeated use of any opioid, can lead to dependence and eventually full-blown addiction1 in many cases.

In conclusion, since all opioids can be habit-forming by nature, and it is impossible for anyone to determine ahead of time whether or not a patient will become psychologically or physically dependent on any given opioid medication, coupled with the fact that there has been an explosion of opioid scripts written (especially hydrocodone, a schedule III controlled substance) and an increase in abuse rates, one must seriously question whether the drug scheduling classes should be re-evaluated and changed to make obtaining and dispensing of all opioids, much more difficult.

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1 The term addiction can be interpreted many ways. For this paper, addiction not only refers to the physical and physiological dependence of an opioid drug, but also encompasses the compulsive behaviors associated with using and seeking the drug, and the newly accepted update to the Diagnostic Statistical Manual of Mental Disorders, which includes “the disease process that the substance triggers in the brain—a process that disrupts the brain’s anatomical structure, chemical messaging system, and other mechanisms responsible for governing thoughts and actions” (Markel, 2012).
Chapter Three: Literature Review

The previous two chapters illustrated a significant increase in the prescription and abuse rates of opioid medications. But, what is ultimately causing this increase? Unfortunately, there is not just one, single cause that can be easily addressed to remedy this problem. In fact, the list of possibilities is too numerous to explore in its entirety in this paper. Therefore, relying on a conceptual and empirical review of peer and non-peer reviewed research, this chapter focuses on a few of the major issues, to be followed by possible solutions in the next chapter.

To start, arguably the biggest problem associated with the increased prescribing of narcotic medication, is best summed up in a statement made by Dr. Christopher Okunseri, who said, “Doctors don’t have the training or expertise to provide definitive care, so the easy way out is medication” (Saint Louis, 2012). Though this particular statement was made in reference to emergency room doctors treating the overabundance of patients seeking pain relief for reported dental pain in emergency room settings, in actuality this statement could be broadened to physicians treating pain relief in general, regardless of the medical setting. Dr. Gail D’Onofrio continued on to say, “When a patient presents pain,…it’s difficult to make an objective assessment. It puts the physician in a difficult situation to assess whether or not someone truly needs pain medicine. We err on the side of treating pain, and it’s a huge potential for abuse” (Saint Louis, 2012). Furthermore, given that many medical providers, especially emergency rooms, are constantly swamped with a continuous flow of patients, physicians are also trying to
find the quickest and easiest way to move patients through the process, and medication is often the “easiest way out.”

But as discussed in chapter two, the Controlled Substances Act of 1970 was enacted to control the use and distribution of illicit and legend drugs (those requiring prescriptions) deemed as controlled substances. The classification system itself was also designed to alert physicians about the potential for abuse by rating the controlled substances from high potential to low potential for abuse and dependence. Interestingly, however, according to a recent study conducted by Jonathon M. Parker and E. Paul Larrant (2009), many physicians view the regulations set forth in the Controlled Substances Act as negatively impacting their ability to practice effective medicine. Many believe that the Act, by attempting to control third party abuse of drugs such as opioids, actually causes suffering in patients who need the drugs. Therefore a majority of physicians supported a proposal to allow schedule II drugs to be written for refills, but an overwhelming majority, 88 percent, also acknowledged that their medical school education did not provide adequate training and insight into the scheduling system (Parker & Larrant). In another study cited by Dr. Jacob Teitelbaum, M.D. (2004), over 96 percent of physicians surveyed were dissatisfied with the training they received in medical school about opioid medications, and 84 percent were dissatisfied with such training received in fellowships and residencies. These studies support the argument presented in chapter two that many physicians do not have the proper training regarding these medications, and as a result, tend to collectively share a naïve attitude toward the relative ease whereby patients can quickly progress from normal patients seeking genuine pain relief to full-blown drug addicts. Additionally, since all opioids can be habit-forming, and the potential for dependence cannot be predicted for patients receiving the medication regardless of its drug class, any patient can easily become dependent and/or addicted to any opioid, regardless of the class schedule. This fact seems to be overlooked by many prescribing physicians as well.
Since opioid medications can be highly habit-forming, one must wonder why medical practitioners do not regularly, or at least initially seek alternative pain management options. A primary reason cited is the failure for insurance companies to pay doctors to spend time with patients. On average, insurance companies only pay for approximately eight minutes spent per patient (Teitelbaum, 2004). In other words, for routine visits not requiring major procedures, the longer doctors spend with patients, the more money they will ultimately lose in doing so. Though it is outside the scope of this paper to discuss the flawed nature of the healthcare system pertaining to insurance and medical care coverage, this issue is a major concern for the purposes of this paper because it in effect has numerous unintended consequences with regard to the over-prescription of opioid medication. A few are as follows: (1) medical practitioners often resort to the quickest, easiest, most cost effective way to treat patients, which, as shown earlier, is the frequent writing of pain medication scripts; (2) due to the volume of patients seen on a daily basis by an overwhelming majority of medical practitioners (at least among those who regularly prescribe pain medication), medical practitioners are often rushed to move patients through the system therefore they tend to cut corners. For example, they will not always take the time to check state-wide drug monitoring websites for possible drug-seeking patients, or they might not take the time to read through patient files or histories before consultations; therefore might unknowingly continue to prescribe medication to a drug seeking patient (such was the case in the introduction section where a patient was able to obtain a three month supply of narcotics within three weeks from one medical practice); and (3) there is no incentive anymore for medical practitioners to seek alternative pain relief options for patients, because it is more time consuming for physicians (who will ultimately lose money if they do so) and for patients, such alternatives are often not covered by insurance. This was not necessarily the case historically, in the days when doctors still made house calls, before the overabundance of medical facilities, before the creation of the modern-day healthcare system, and where home-remedies were often used and
preferred over calling on a physician to treat common ailments. Because of this, it makes sense as to why there is very minimal training in the area of alternative medicine within medical schools, fellowships, and residencies. But regardless, flaws in the healthcare system or lack of proper training should not be systematically allowed to be used by medical practitioners as excuse to cut corners or practice medicine in a careless or reckless manner.

Another more recent phenomenon used in conjunction with the Controlled Substances Act in an effort to control the use and abuse of prescription medication, is the creation of state-wide prescription monitoring programs. Indiana uses INSPECT, which is a state sponsored drug monitoring website that allows medical practitioners, law-enforcement officers, and community supervision officers to monitor controlled substances dispensed to patients and identify potential ‘doctor-shoppers’ and ‘pharmacy hoppers’ (2012). This is a very confidential website, and the data is treated and protected like any other medical records. Only a very limited number of persons are allowed access, and access is only granted after a request is submitted to the state and the state determines a need for access. Once access is granted, patient searches can only be conducted if there is a reason to search (i.e. in the course of a law-enforcement investigation, medical practitioners checking for ‘doctor-shopping’ patients, or probation officers ensuring compliance with probation rules). As it stands right now, all controlled substance scripts dispensed by medical practitioners (with a few exceptions) must be sent to the state and are recorded on the website. When searches are conducted, the results will show the following information: the type of medicine dispensed, the date the script was filled, the prescribing physician, the filling pharmacy, the quantity of medication, whether it was a new script or a refill of an old script, and the type of payment used to pay for the script (INSPECT, 2012).

However, even though many states have implemented these programs, a majority of physicians practicing in states with such programs, are not using them on a regular basis, if at all. In fact, a 2011 study revealed that over 84 percent of surveyed physicians were aware of a state
monitoring program, but only 59 percent who were aware of the programs actually used them (Feldman et. all, 2011). This needs to be addressed because the current research seems to support the effectiveness of these programs. A study published just this year used data compiled from the RADARS System Poison Center and Opiate Treatment databases, collected between 2003-2009, to compare opioid misuse and abuse trends. The conclusions that resulted showed a correlation between prescription monitoring programs and reduced opioid abuse rates, as states with monitoring programs in place only saw a 0.2 percent increase in intentional opioid exposure per quarter whereas states without such programs saw a 1.9 percent increase (Reifler et. all, 2012). These programs are still very new, therefore future research will need to continue to determine their effectiveness. But the small amount of research that has been done is very promising. Nonetheless, medical practitioners are not using these programs when available, perhaps the result of reasons listed above, but this trend needs to change and these programs need to be used when available.

In the last few decades, the United States and the rest of the world, has quickly moved into the digital era. This has extended into the practice of medicine as well. When it comes to writing prescriptions, the trend is moving toward an electronically based computer system and away from paper scripts and prescriptions called into the pharmacy by phone. There are a couple major reasons to transition into an electronic prescribing system, with regard to writing opioid scripts. First, preventable, prescribing error rates of three to five per one thousand scripts have been frequently documented (Schiff & Bates, 2000). Additionally, “physician drug choices have been rated as ‘inappropriate,’ ‘unnecessary,’ or ‘questionable,’ in a large number of prescriptions assessed” (Schiff &
Bates, 2000). Schiff and Bates (2010) argue that this is the result of “ignorance” in the understanding of how drugs work both independently and relative to other alternatives, what adverse effects these drugs have and how frequently they occur in patients, and the need for drug therapy to be more individualized from patient to patient. An electronic prescription database could easily track and store such information and be quickly accessed and used by medical practitioners.

Another reason to use electronically produced prescriptions is to reduce the number of altered or forged prescriptions, and the number of non-legitimate prescriptions called into the pharmacy by drug seekers, or associates helping acquaintances obtain illegal prescriptions. Today, prescriptions are written on a special, watermarked paper that when photocopied, the word ‘void’ will appear across the copy. This obviously makes it more difficult to counterfeit. But even so, anytime a prescription is handwritten, it can be easily changed by addicts who are constantly seeking larger quantities of drugs than are usually prescribed, and who often have experience engaging in such criminal behavior. Though any document has the ability to be altered, forged, or counterfeited, an electronically produced prescription on the required special prescription paper, can only reduce the alteration rates even more. Furthermore, an electronic prescription database system can virtually eliminate the need for phone-in prescriptions all together, because the system would interlink medical practices with pharmacies, the scripts could be transmitted more easily, and all transmissions would be automatically recorded.

By no means is an electronic prescription data base system going to be a flawless system. Obviously, people can and will find ways to circumvent any system, but an electronic system is more effective, efficient, and will eliminate many human errors.
Chapter Four: Suggested Solutions to Policy Problem

When finding solutions to any policy problem, one must understand that there is rarely a single, cure-all solution; rather a multi-faceted approach is often required. The issue of controlling narcotic medications is no exception. As with the illegal drug market, government regulations are constantly battling against the laws of supply and demand. But what makes the prescription drug fight different from the war on ‘illegal’ drugs is the fact that narcotic medications are widely accepted as having legitimate medical purposes. And while some could (and do) argue that other substances deemed as ‘illegal’ also have legitimate medical purposes (such as marijuana, cocaine, and heroin), the majority of society and the government has determined that such substances do not have medical value and are only in existence for the purpose of getting intoxicated; therefore are ruled as ‘illegal.’

Nevertheless, anytime the government steps in and attempts to regulate prescription medications (or even over-the-counter medications such as Sudafed, a key ingredient in making methamphetamine), it is often met with resistance from citizens, who argue that such regulations only hinder the ability of the law-abiding to seek and receive treatment for legitimate ailments. On the flip side, however, because these medications are so readily available, drug addicts who would otherwise abuse illegal substances, now have very easy access to legal substances that can produce the same state of intoxication as illegal substances, or even more so. So, the question

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2 Some states have allowed certain substances that are generally considered illegal, such as marijuana, to become legal only if used for medical purposes, but these states are few in number and so will remain outside the scope of this study.
becomes, how much government intervention is necessary to combat a seemingly increasing problem of abuse of narcotic medication, while at the same time still allowing these substances to be used to treat legitimate medical issues? It should be noted that the writer does have sympathy for patients with genuine issues requiring narcotics and understands the frustration that will result in having to jump through the proverbial hoops in order to obtain the medications, but due to the fact that by nature, opioids can be habit forming, and with or without good monitoring by a physician users can easily become dependent on these medications, the writer believes that only the strictest regulation should be tolerated. The following proposals would be in addition to the various laws and regulations currently in place.

To start, the federal government needs to reclassify the scheduling system and make all opioids, whether natural, semi-synthetic, or synthetic, Schedule II controlled substances, and not allow these medications to be written for refills. This would force all patients to consult with the prescribing physician on a monthly basis and allow the physician to reassess the patient’s progress and determine if the patient still needs the medication. More frequent patient/physician contact would also allow for the doctor to monitor the patient for signs of dependence and abuse and stop the medication if such signs arise.

Next, all states should be required to create and use a state-wide data base to track narcotic prescriptions dispensed, and all state websites should be linked together. Right now not all states have one, and with the ones that do, they are not all interlinked. There are, however, three primary limitations, at least to the current Indiana INSPECT website: (1) It does not track controlled substances administered in an emergency room visit, which is a common hub for drug seeking patients; (2) It does not monitor methadone or buprenorphine (Suboxone) dispensed out of all methadone clinics or Suboxone clinics; (3) Physicians and pharmacies are rarely (if ever) prescribed

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3 Only ‘qualifying physicians’ are allowed to prescribe methadone or buprenorphine. In order to qualify, a physician must complete specific training and/or experience in the treatment of opioid addiction.
penalized for not checking the website prior to writing or filling any script for patients. Consequently, many physicians are not checking the site prior to writing scripts (Saint Louis, 2012). This leads into the next proposed solution.

All narcotic medication, whether dispensed in a hospital setting, emergency room setting, nursing home, or by regular script, should be reported to the state and recorded on the state monitoring website. Furthermore, medical practitioners and pharmacy personnel should be required by law to check the state monitoring website before writing a script or filling a script for a patient. If it is determined that a patient is ‘doctor-shopping’ or ‘pharmacy-hopping,’ the script should not be given or filled for the patient and law-enforcement should be contacted. If this is not done and patients are found to be obtaining scripts illegally (i.e. ‘doctor shopping’ or ‘pharmacy hopping’), and it can be proven that the scripts are legitimate and not forged, altered, or counterfeited, then the writing physician(s) and/or filling pharmacies should be penalized accordingly, assuming the writing physician and/or filling pharmacy had knowledge of such, or should have had knowledge but did not due to carelessness or negligence. Additionally, there should be an added section to the state monitoring websites that would track and flag all individuals who are arrested, convicted, or under court-supervision for drug related offenses. This would give a red-flag to medical practitioners about a patient’s possible drug addiction history, and allow them to be treated accordingly. After all, it can be automatically assumed that addicts seeking drugs generally will not be honest and open about their substance abuse history.

When writing scripts, medical practitioners should be required to use digitally produced scripts. Though virtually any document has the potential of being counterfeited, this could arguably cut down on the forged or altered scripts, which seem to be overwhelmingly handwritten scripts. It could also eliminate the need for phoned-in scripts to the pharmacy. Doctors could definitely keep paper copies in patient files, but any script handed to a patient should be digitally produced using the standard watermarked script paper.
Lastly, any medical practitioners who have the authority to write prescriptions should be required to attend regular training seminars about the pharmacology of opioid medications, the risks involved when prescribing the medications to patients, and possible alternative treatments for various ailments routinely treated with pain medication, before being allowed to write opioid scripts. Recently, President Obama issued a proposal similar to this that should be adopted. This proposal includes action in four areas: (1) educating the public about the dangers of opioid/prescription abuse and how citizens can take appropriate precautions with their prescriptions to keep them out the hands of others; this education would also include training for prescribers who request Drug Enforcement Agency registration on “responsible opioid prescribing practices;” (2) increase the use of prescription drug monitoring programs; (3) develop a “consumer-friendly” and “environmentally-responsible” drug disposal program to dispose of unused or unwanted prescription medication; and (4) provide law-enforcement the tools and capability to shut down “pill mills” and stop “doctor shoppers” who contribute to the illegal possession and sales of opioid medication (Executive Office of the President of the United States, 2011).

To take Obama’s proposal further, the writer suggests that medical practitioner training should also have a strong emphasis on drug addiction and the ‘anatomy’ of a drug addict. By this, the writer means training seminars should provide an in depth look at common behaviors demonstrated by drug addicts such as: lying, stealing, manipulation tactics to obtain drugs, ways attempted to hide their addiction, how addicts appear and act under the influence of various drugs, and the countless ways people with good intentions knowingly or unknowingly enable addicts to continue in the addiction cycle. Perhaps if physicians had a better understanding about human behavior and the nature of drug addiction, they would be less likely to initially resort to habit-forming pain medication instead of alternative pain treatment.
Conclusion

Before beginning medical practice, medical practitioners often recite the Hippocratic Oath, which dates back to approximately 5th Century B.C. One of the oaths states that the practitioner will, “apply dietetic measures for the benefit of the sick…and keep them from harm and injustice” (Edelstein, 1943). Medicine is an art, not just a science. Consequently, practitioners are constantly trying to strike an even balance between helping patients while at the same time, not hurting patients. But in many instances, there is a very, very fine line that is often blurred. Such is the case with prescription narcotic medication. It is true that these medicines serve a very useful purpose in relieving pain. However, these medications are also highly addictive and widely abused. Subsequently, the only sensible way to properly control and use these medications in the treatment of legitimate ailments while at the same time curbing the potential for abuse, is to enact very strict regulations for medical practitioners and pharmacy personnel in the writing and filing of such scripts. By no means are strict laws and regulations going to eradicate opioid abuse and there will always be ways to circumvent the system as illustrated in the case studies presented in the introduction section of this paper. Nevertheless, because the government has deemed these medications as medically appropriate and legal, but at the same time recognizing the high potential for abuse (hence the creation of the Controlled Substances Act), the government has an obligation to do everything in its power to ensure that these medications are only being used for their intended purpose.
Lastly, while is true that physicians are constantly under pressure to treat a voluminous number of patients on a daily basis, and the current healthcare system can be almost prohibitive at times in allowing physicians to individualize care or seek alternative treatments, this cannot be an excuse for medical practitioners to remain ‘ignorant’ in the dangers of opioid medication or practice medicine in a careless or negligent manner. Rather, they need to be overly vigilant and careful that the thin line is not crossed from helping to relieve pain to creating an entire population of drug dependent/addicted patients.
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