

Arizona Criminal Justice Commission

Statistical Analysis Center Publication

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The Arizona Rx Drug Misuse and Abuse Initiative: A Multi-Systemic, Multi-Level Approach for Addressing Arizona's "Silent Epidemic"



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EXECUTIVE SUMMARY

The Arizona Rx Drug Misuse and Abuse Initiative was created in response to the rising rates of prescription drug misuse and abuse in Arizona and the correlated negative outcomes facing our state. The data providing the impetus for action included the following findings:

- Arizona currently ranks 12th highest in the nation for rates of prescription drug misuse and abuse for individuals 12 years and older.
- Arizona currently ranks 12th highest in the nation for opioid-related overdose deaths.
- Non-fatal opioid poisonings in the Arizona Emergency Departments increased 100% between 2008 and 2013.
- The number of individuals arrested in Arizona for Driving Under the Influence of Drugs has increased 99% in the past decade.

Led by the Arizona Substance Abuse Partnership, sector experts from around the state gathered together to review the data, the science and the suggested strategies proposed by the White House Office of National Drug Control Policy. The result of this meeting were five key strategies and corresponding measurable goals, objectives and action items that were synthesized into the Arizona Rx Drug Misuse and Abuse Initiative action plan. The strategies are as follows:

1. Reduce Illicit Acquisition and Diversion of Prescription Drugs
2. Promote Responsible Prescribing and Dispensing Policies and Practices
3. Enhance Prescription Drug Practice and Policies in Law Enforcement
4. Increase Public Awareness and Patient Education About Prescription Drug Misuse
5. Enhance Assessment and Referral to Treatment

The Arizona Rx Drug Initiative model was designed to be a coordinated effort between action items implemented at the state and policy level, in conjunction with corresponding action items implemented at the local level through substance abuse community coalitions. This top down meets bottom up approach is overseen by a “core group” of several state agencies that meets regularly to review and implement the statewide strategies in the action plan, discuss implementation of the model at the local level and identify solutions to emerging issues impacting the model. A member of the core group serves as the project coordinator for the local level implementation, creating a systematic feedback loop between the two levels of implementation. The model was originally piloted in Yavapai, Pinal, and Graham/Greenlee Counties beginning in July of 2012 through December of 2013.

Implementation at the community level began with each pilot site hosting a town hall to raise awareness of the problem, gain consensus on the action plan, leverage partners and resources and to identify and gain commitment from local sector champions for implementation of the model. Each site then began full implementation that included the following action items: prescription drug drop box installations and promotion of proper storage and disposal; general risk messaging and public outreach and education; outreach to local hospitals and emergency departments, community prescriber and pharmacist to promote use best practice guidelines and use of the Arizona Controlled Substance Prescription Monitoring Program (CSPMP); and the Rx Diversion Crimes training for local law enforcement.

Implementation at the state level included developing and disseminating best practice guidelines for prescribers and pharmacists; unsolicited prescriber report cards with detailed descriptions of individual prescribing habits; improvements to the CSPMP and marketing use of the tool among prescribers, pharmacists and law enforcement; networking and education outreach with regulatory boards, insurance companies, hospitals, health centers, health care provider agencies and associations, local and state public health and behavioral health prevention groups, law enforcement councils and associations, drug taskforce groups and substance abuse coalitions across the state.

To evaluate the efficacy of the Arizona Rx Drug Misuse and Abuse model, a basic pre-post design was used to track and analyze process, impact and outcome measures for the goals, objectives and action items implemented in the model. Highlights of the process evaluation include the following:

- Over 13,000 youth have been reached with prescription drug education programming.
- Over 1,500 prescribers are receiving unsolicited report cards to raise awareness of problematic prescribing patterns.
- Over 300 law enforcement officers in Arizona have received training and education on prescription drug diversion crimes.
- Over 26,000 people have attended presentations and community events to hear about the prescription drug misuse problem and the Arizona Rx Drug Initiative.
- Over 900,000 people have been reached with public awareness and educational materials.

Highlights of the impact evaluation include the following:

- Over 14,000 pounds of medication has been collected from drop boxes and take-back events.
- Public awareness has increased about drop box locations and proper storage and disposal.
- Youth obtaining prescription drugs from home has decreased 10 percent.
- Active queries made by Arizona prescribers to the CSPMP has increased 83 percent.
- Rates of controlled substance prescriptions and pills have decreased in Arizona (range=2.3 percent to 16.6 percent across the five drug categories of interest).
- Law enforcement officers are more aware of the problem and have gained significant knowledge in prescription drug diversion crimes.
- The community is more aware of the problem and the risks of misuse.
- Parents feel more equipped to have prescription drug conversations with their children.
- Fewer youth think that misusing prescription drugs is socially acceptable.

Highlights of the outcome evaluation include the following:

- Past 30-day prescription drug misuse rates among Arizona youth declined 20 percent.
- Arizona saw a 10 percent decrease in non-fatal poisoning-related inpatient hospitalizations.
- Pilot counties saw a 28 percent reduction in rates of opioid-related deaths, while non-pilot counties saw a four percent increase.

In summary, the Arizona Rx Drug Misuse and Abuse Initiative model produces effective results and generates a remarkable return-on-investment. Based on the findings from the pilot project, a statewide toolkit has been developed and the model has been expanded throughout several communities in Arizona. The state level strategies also continue to evolve and adapt to ensure continued success for combatting Arizona's "silent epidemic." For more information and resources, please visit our website: <http://www.azcjc.gov/acjc.web/rx/default.aspx>

The Arizona Rx Drug Misuse and Abuse Initiative: A Multi-Systemic, Multi-Level Approach for Addressing Arizona’s “Silent Epidemic”

1 ABSTRACT

This report outlines the efforts made in Arizona to develop, implement, and test a collaborative model between state agencies and local communities that was designed to reduce rates of prescription drug misuse and related morbidity and mortality. The five strategies of the Initiative involve medical, treatment, law enforcement, and community prevention sectors and include action items that transverse the supply and demand side of the prescription drug misuse and abuse problem in Arizona. The results of the state-level and pilot project implementation are discussed in detail and evaluation results are provided to demonstrate the feasibility and efficacy of the model.

2 PERVASIVENESS OF THE PROBLEM

2.1 RATES OF PRESCRIPTION DRUG MISUSE AND ABUSE IN ARIZONA

2.1.1 Youth Misuse

The toll of prescription drug misuse and abuse is becoming increasingly well known. Nationwide, more than 22,000 people die every year of prescription drug overdoses (Centers for Disease Control and Prevention, 2014). Like most states in the country, Arizona is not immune from the prescription drug misuse epidemic. According to the 2014 *Arizona Youth Survey*, 6.3 percent of Arizona youth reported past 30-day misuse of prescription drugs, and Arizona’s rates among high school seniors were higher than the national average (Monitoring the Future, 2013). The majority (74.4 percent) of youth prescription drug misuse involved potentially dangerous and addictive pain relievers, and over one third of youth who reported using prescription pain relievers also reported cocktailing them with alcohol in the same event.

2.1.2 Adult Misuse

Rates of adult prescription drug misuse in Arizona are also alarmingly high, with 50 percent of adults reporting misuse in the past 12 months and 13 percent reporting misuse in the past 30 days (St. Luke’s Health Initiatives Survey, 2010). Although rates of adult prescription drug misuse transverse all age categories and regions in Arizona, significantly higher rates were reported among individuals living in the Southeastern region of the state and for individuals 45 years and older. Similar to youth, the majority of the misuse involved pain relievers (47 percent). Given the staggering rates among our youth and adults, it is no surprise that the *National Survey on Drug Use and Health* (2012) ranked Arizona as having the sixth highest rate of non-medical use of prescription pain relievers in the country for individuals 12 years of age and older at the onset of the Initiative.

2.2 RATES OF CORRELATED NEGATIVE CONSEQUENCES IN ARIZONA

2.2.1 Mortality Rates

The rise of prescription drug misuse in Arizona has created a host of negative outcomes and associated societal and health costs. Like 28 other states and the District of Columbia, drug poisonings have surpassed motor vehicle crashes as the leading cause of injury deaths in Arizona. Arizona drug poisoning deaths increased five percent from 2008 to 2012. After alcohol (18 percent, n=207), the two most commonly specified poisons on 2012 death certificates were oxycodone or hydrocodone (16 percent, n=179) and benzodiazepines (nine percent, n=103) (Arizona Department of Health Services, 2014a). In short, nearly 40 percent of the 6,000 drug overdose deaths that have occurred in Arizona since 2008 involved prescription drugs – claiming more lives than heroin and cocaine combined.

2.2.2 Morbidity Rates

Rates of non-fatal opioid-related poisonings in the Arizona emergency departments have also increased dramatically, with a 100 percent increase from 2008 to 2013. In 2013 alone, there were 9,860 visits to the emergency department that involved the non-medical use of pain relievers (Arizona Department of Health Services, 2014b). Likewise, rates of opioid-related abuse and dependency cases in the emergency department increased significantly from 2008 to 2013 (101 percent and 98.6 percent, respectively), with some counties having dependency rates as high as 76 percent of their total opioid-related cases (Arizona Department of Health Services, 2014b). Similarly, 95 percent (n=6759) of non-fatal poisoning-related inpatient hospitalizations involved drugs (prescription and non-prescription) – a 20.8 percent rate increase from 2008 to 2012 (Arizona Department of Health Services, 2014a). The brunt of these outcomes is felt by employers and the healthcare industry, with an estimated \$72 billion in costs due to prescription opioid abuse (Behavioral Health Coordinating Committee: Prescription Drug Abuse Subcommittee 2013).

2.2.3 Criminal Justice Costs

In addition to the public health costs associated with the growing prescription drug misuse problem in Arizona, the public safety and criminal justice systems have also incurred considerable burden. For example, statewide, the number of individuals arrested for driving under the influence of drugs (DUI-D) has increased over 99 percent in the past decade, and narcotic drug possession arrest rates saw a 15 percent increase in the two-year period from 2010 to 2012. Additional spikes in pharmacy robberies and costly investigations involving fraudulent prescribing and doctor-shopping practices have also been reported by local law enforcement agencies.

2.3 IDENTIFYING THE CONTEXTUAL FACTORS THAT ARE AMPLIFYING THE PROBLEM

2.3.1 Volume and Access

From an accessibility perspective, the volume of prescription drugs dispensed in Arizona alone is significantly contributing to the problem. According to data from Arizona's Controlled Substance Monitoring Program (CSPMP), there were over 9.6 million Class II-IV prescriptions written and 575 million pills dispensed in Arizona in 2013. This equates to 87.4 schedule II-IV controlled substance pills for every person - adults and children - living in Arizona. Prescription pain relievers accounted for 51.2 percent of these prescriptions, with opioids like Hydrocodone (e.g., Vicodin) and Oxycodone (e.g., Oxycontin) accounting for the majority (80.9 percent) of Pain Relievers (Arizona State Board

of Pharmacy, 2013) (Figure 1). The number of prescription pain relievers prescribed in Arizona is enough to medicate every adult around the clock for more than two weeks straight, with numbers as high as four weeks straight in some areas of Arizona. Based on probability and access alone, the supply of prescription drugs in Arizona communities, particularly opioids, is a major contributing factor to the rates of prescription drug misuse and related negative consequences in our state.

2.3.2 The Demand Side of the Equation

There are numerous other contextual factors that have contributed to the influx of prescription opioids in Arizona. On the demand side of the equation, you have an uninformed public who are relatively unaware of the potential risks involved with prescription opioid misuse. This lack of awareness has led to a multitude of problematic behaviors, including: individuals taking prescription opioids for recreational purposes; individuals taking more of their own medication than prescribed; individuals mixing prescription opioids with alcohol and other prescription and illicit drugs; people sharing medications with others; and people failing to properly store and dispose of unused, unneeded, and expired medication. Illustrating the problem of improper storage and disposal methods is the fact that approximately three-quarters of Arizona youth who have misused prescription drugs in the past 30 days report getting them from friends, family, or right out of the home medicine cabinet.

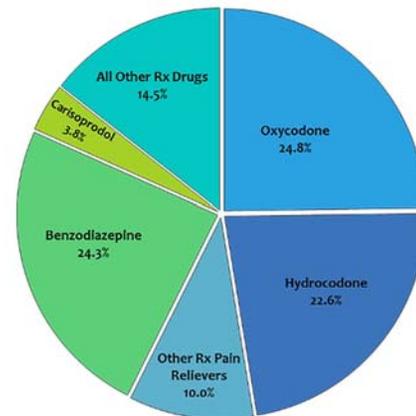
The misperception of safety also creates an additional problem for youth – parents unaware of the urgency around this topic are less likely to talk to their children about the risks of prescription drug misuse, and they are less likely to establish clear “no use” expectations and resistance strategies for their children to use to get out of situations where they may be offered prescription drugs. The 2014 *Arizona Youth Survey* supports this hypothesis, with more than 51 percent of youth reporting that their parents have never talked to them about the risks of prescription drug misuse.

An additional factor on the demand side that is contributing to rates of prescription opioid misuse in Arizona involves the direct expectations of the health consumer around the concept of pain management. For many pain patients, the expectation is that pain management should equate to minimal or zero pain, rather than a set of strategies to manage the continuum of pain inherent in acute and chronic pain situations. For a variety of reasons, some patients may be unwilling to consider non-narcotic or even non-medicated alternatives to prescription opioid treatment. Other patients may simply be unaware of these alternatives or too hesitant to ask questions about them during their care.

2.3.3 The Supply Side of the Equation

The web of complexity on the supply side of the prescription drug misuse equation is even more profound in Arizona. Many prescribers are simply unaware of the pervasiveness of misuse and abuse in our population, and many are unaware of how their individual prescribing practices may be contributing to the problem. The lack of awareness has created a two-pronged problem: (1) an ample window of opportunity for diversion crimes in Arizona, including individuals using “doctor shopping” practices to acquire and illegally sell prescription opioids and other controlled substances;

Figure 1.
Percentage of Pills by Drug Type in Arizona (2013)



and (2) a portion of the long-term opioid patients at risk for dangerously high doses or dangerous drug combinations – putting this population at the highest risk for accidental overdoses due to respiratory distress complications.

Arizona has also had its fair share of pill mills and individual “Candy Man” prescribers who have contributed to the staggering rates of misuse and negative health consequences through extreme overprescribing practices that clearly fall outside the standards of care for ensuring patient safety. While law enforcement in Arizona are making attempts to address these kinds of problematic prescribers, obtaining relevant and timely information on fraudulent prescribers is problematic, investigations take months, prosecution is often difficult, and by sheer nature of their purview, they are unable to comprehensively address the saturation of this problem from a public safety-only approach.

Another contributing factor to the prescription drug misuse problem in Arizona was that there were no consistent set of statewide clinical guidelines for prescribing opioids at the onset of the Initiative. As a result, many prescribers often had difficulty knowing how to balance the legitimate pain needs of their acute and chronic pain patients while both ensuring patient safety and minimizing patient complaints that may affect reimbursement, performance evaluations, promotions, and in some cases, their ability to remain employed. This type of landscape simply increases the probability of creating and reinforcing overprescribing. Couple this factor with health consumers’ growing demand for zero pain and the tolerance factor inherent in long-term opioid use, and a vicious cycle for increasing the likelihood of potentially lethal dosage levels and dangerous drug combinations ensues.

Although many of the aforementioned challenges related to diversion, dangerously high doses, and harmful drug combinations could be minimized by prescribers and pharmacists checking their patients’ medication histories, only 31 percent of prescribers writing for controlled substances are signed up to access the state Controlled Substance Prescription Monitoring Program (CSPMP). Of those who are signed up, very few are consistently accessing the tool in a manner that would be effective for systematically addressing misuse and abuse. Pharmacists fare a little better in this area, with a 60 percent sign-up rate in Arizona, still leaving over one-third who are not actively checking their patients’ medication histories prior to dispensing. Despite that the CSPMP was established in 2007, many prescribers and pharmacists are unaware of its existence, some may be unconvinced of its utility for ensuring patient safety, and others are aware of the tool, but opt not to use it based on the additional time it costs them in their daily practice.

3 DEVELOPING A SOLUTION: THE ARIZONA RX INITIATIVE

ONTOLOGY

3.1 THE STATEWIDE SUMMIT TO ADDRESS RX DRUG MISUSE AND ABUSE

Recognizing the severity of the prescription drug misuse problem in Arizona, the High Intensity Drug Trafficking Area (HIDTA) took the initial lead to combat the problem in Arizona and hosted a statewide summit in October of 2011 to discuss the pervasiveness of the problem and potential strategies to combat the growing epidemic. Speakers included representatives from the White House Office of National Drug Control Policy (ONDCP), the Drug Enforcement Agency, the Arizona HIDTA, the Arizona Department of Health Services, the Arizona Criminal Justice Commission, and

DrugFreeAZ. Break-out sessions grouped by sector (i.e., law enforcement, medical and community prevention) followed the formal presentations and focused on contributing factors and a review of suggested strategies from ONDCP.

3.2 THE ARIZONA SUBSTANCE ABUSE PARTNERSHIP

Following the statewide summit, the Arizona HIDTA and the Arizona Criminal Justice Commission presented data detailing the severity of the problem in Arizona to the Arizona Substance Abuse Partnership (ASAP). Staffed by the Governor's Office, ASAP is the single statewide council on substance abuse prevention, treatment, enforcement, and recovery for the state of Arizona and includes membership from various state and local agencies, including local substance abuse coalitions. In January of 2012, ASAP made prescription drug misuse and abuse their strategic area of focus, and the Arizona Rx Drug Misuse and Abuse Initiative was created. With no appropriated funding available, the members of ASAP made a voluntary commitment to move forward by leveraging the existing resources and expertise of current members as well those of external colleagues and stakeholders.

3.3 THE EXPERT PANEL AND STAKEHOLDER STRATEGY MEETING

In an effort to build a broader network of leveraged partners and gain strategy consensus across the three sectors of law enforcement, the medical community, and the prevention community, the Arizona Criminal Justice Commission and the Governor's Office for Children, Youth, and Families hosted an expert panel discussion and strategy meeting in February 2012. Members of the panel included representatives from state regulatory and licensing boards, insurance companies, the Arizona Attorney General's Office, Arizona State University, the University of Arizona, the state Epidemiology Work Group, Indian Health Services, pain management specialists, emergency department physicians, nurse practitioners, injury prevention specialists, the Arizona HIDTA, the Arizona Criminal Justice Commission, the Arizona Department of Health Services, and a representative from the Substance Abuse and Mental Health Services Administration (SAMHSA) who participated telephonically.

Using the contextual factors that were previously identified in the statewide summit and local Arizona data, a list of pre-determined questions was asked of each sector and the sector experts provided guidance on the factors that they believed most important to address. The panelists discussed how the prescription drug problem was affecting each of the systems represented and what the data and research was saying about how to impact the problem. This set the stage for the remainder of the day to focus on solutions for the factors identified by the experts as either: (1) in need of immediate attention; or (2) most critical for success.

The remainder of the day was spent in sector-based break-out sessions that included members of the expert panel. Each group was provided a copy of the strategies suggested by ONDCP and a data-brief detailing the statistics that highlighted demographic and geographic groups most affected by the prescription drug misuse problem in Arizona, the related rates of consequences throughout Arizona counties, and detailed statistics on contextual factors. The data-brief was provided to ensure adherence to a data-driven approach and to ensure that resources were targeted towards strategies that would maximize return-on-investment for reducing rates of prescription drug misuse and abuse in Arizona.

A facilitator used a strategy template that included the ONDCP strategies and any new strategies suggested during the expert panel portion of the day to guide the discussion of the break out groups. Each of the sector groups was prompted to decide whether to approve or table the strategy and to suggest specific measurable goals, objectives, and action items for each approved strategy that could be implemented at the state and community level. The day ended with each sector reporting out the suggested strategies, goals, objectives, and action items and allowing for cross-feedback and inter-group consensus on the proposed methods.

4 THE ARIZONA RX DRUG MISUSE AND ABUSE INITIATIVE MODEL: THE FIVE STRATEGIES OF OUR PUBLIC HEALTH AND PUBLIC SAFETY APPROACH

Based on the final consensus from the expert panel and stakeholder discussion, five key strategies and corresponding measureable goals, objectives, and action items were selected and synthesized into the Arizona Rx Drug Misuse and Abuse Initiative action plan (Appendix 1).

4.1 A TOP DOWN MEETS BOTTOM UP APPROACH

4.1.1 Local Community-Based Substance Abuse Prevention Coalitions

The Arizona Rx Drug Initiative model was designed to be a coordinated effort between action items implemented at the state and policy level, in conjunction with corresponding action items implemented at the local community level. This approach tapped into an existing community-based substance abuse infrastructure and the social capital it represents and allows for new and innovative community-based initiatives to be implemented without the immediate need for a large upfront investment of cash resources. Instead, the focus is placed on leveraging existing community-based networks and the strategic infusion of additional resources to support emerging community needs.

The community coalitions, their task groups, and local champions serve as the primary vehicle of change responsible for spearheading and driving all local efforts across the five strategies. By taking an approach that relies on the leadership and involvement of community members, the Arizona Rx Drug Initiative has leveraged the passion and energy of those who are directly impacted by, and have a vested interest in, the problem of prescription drug misuse and abuse in “their own backyards.”

4.1.2 The Arizona Rx Drug Initiative Core Group

Reinforcing the multi-disciplinary approach that was used to identify the five key strategies and build the Arizona Rx model, several state agencies established a core group of individuals to coordinate and oversee the implementation of the Arizona Rx Initiative and corresponding action plan. This group consists of representatives from the Governor’s Office for Children, Youth and Families, the Arizona Criminal Justice Commission, the Arizona Board of Pharmacy, the Arizona Department of Health Services, the Arizona Health Care Cost Containment System, the Arizona Board of Osteopathic Examiners, and a community prevention expert from Prevention Works, LLC. Since its inception, the core group meets on a bi-weekly basis to review and implement the statewide strategies in the action plan, discuss the implementation of the model at the local level, and identify solutions to emerging issues impacting the model (e.g., resource needs, data needs, statutory barriers, etc.). One

member of the core group serves as the project coordinator for the local level implementation, creating a systematic feedback loop between the two levels of implementation.

4.2 STRATEGY 1: REDUCE ILLICIT ACQUISITION AND DIVERSION OF PRESCRIPTION DRUGS

4.2.1 Goal 1: Increase the use of proper disposal methods for Rx drugs.

As a method of reducing access to the large volume of unused, unneeded, and expired medications kept in the home, the community-based substance abuse coalitions work with their local police departments and county sheriff's office to purchase and install permanent prescription drug drop boxes in manned police departments and substations. Installation of the drop boxes includes commitments by local law enforcement to secure the boxes, provide supervision of the drop boxes, and to safely dispose of the medications in a manner consistent with Drug Enforcement Administration (DEA) rules and regulations. Drop boxes have proven to be a cost effective approach to increasing the safe disposal of prescription medications because of their low cost (\$600-\$800 each) relative to high frequency of use. Drop boxes complement ongoing bi-annual prescription drug take back events by providing for the safe disposal of medications during the time between take back events.

To complement the community level work, a statewide push has also been made to encourage all police departments to install drop boxes. This has occurred by partnering with major law enforcement associations (e.g., Arizona Chiefs of Police, Arizona Prosecuting Attorneys' Advisory Council, Arizona County Attorney and Sheriff's Association) and through direct requests from the Commissioners and the director of the Arizona Criminal Justice Commission. The Arizona Attorney General's Office has also provided additional support by providing funding for the placement of several boxes throughout Arizona.

4.2.2 Goal 2: Increase the use of proper storage methods for Rx drugs in the home.

Likewise, local community members promote the safe storage of prescription medications using a "Check Your Shelf" campaign to alert the general public about the need to safeguard medications in a secure location. The coalitions disseminate education and awareness materials in various forms, including public service announcements, posters, flyers, and post cards that are distributed to various locations and to specific target audiences. Messages include specific instructions around safe storage (e.g., securing medications in a locked container, keeping medications away from kids, etc.) as well as the location of the permanent drop box locations for times when disposal outside the home is needed.

4.3 STRATEGY 2: PROMOTE RESPONSIBLE PRESCRIBING AND DISPENSING POLICIES AND PRACTICES

4.3.1 Goal 1: Provide education and training for prescribers, pharmacists and their patients

4.3.1.1 Best Practice Guidelines

To promote responsible prescribing and dispensing policies and practices, the Arizona Rx Drug Initiative encourages the use of best practice guidelines for emergency department and community-based prescribers writing the prescriptions and for pharmacists dispensing the medication. The *Arizona Emergency Department Guidelines for Prescribing Opioids* were developed in 2012 by the Arizona Department of Health Services during a consensus building session where emergency doctors

participated in the review of guidelines being used in other states and identified the guidelines, both already in use and new, to be used in Arizona. The *Arizona Guidelines for Dispensing Controlled Substances* were also developed in 2012 during a consensus building session hosted by the Arizona Criminal Justice Commission, the Arizona State Board of Pharmacy, the Arizona HIDTA, and the Arizona Pharmacy Association. In both consensus building sessions, prescribers and pharmacists from across the state reviewed guideline options and selected those guidelines that they believed would reduce the inappropriate use of controlled substances while preserving the vital role of the prescriber and pharmacist to treat patients with medical conditions.

In March of 2014, the Arizona Department of Health Services Staff also worked with community-based prescribers and the medical associations in Arizona to develop a consensus for prescribing guidelines for community-based prescribers. The *Arizona Opioid Prescribing Guidelines* include a set of twelve chronic pain and six acute pain guidelines that help prescribers balance patient safety while preserving the vital role clinicians and patients play in the management of acute and chronic pain.

Dissemination of all three sets of guidelines occurs at the state level through email blasts, website repositories, and partnering with relevant associations to include them in their newsletters, annual conferences, and other outreach mechanisms. At the community level, medical champions and other coalition members partner with local hospital and emergency department administration to encourage adoption and use of the guidelines, and they disseminate the dispenser and community-based guidelines in a door-to-door approach.

4.3.1.2 Prescriber and Patient Education

Additional methods used in the Arizona Rx Drug Initiative to promote responsible prescribing and dispensing include providing clinicians with training and education, as well as equipping them with pain management tools and resources to review with their patients. At the state level, training includes members of the core group partnering with the coalitions to provide local in-person training on the pervasiveness of the problem, use of the CSPMP, review of best practice guidelines and patient prevention material. Various forms of these trainings also occur throughout the state at invited conferences, trainings, and special sessions for prescribers and pharmacists. In 2014, the Arizona Board of Osteopathic Examiners also began hosting Continuing Medical Education trainings on opioid prescribing throughout regions of the state. At the coalition level, outreach to doctors involves a peer-to-peer approach, where medical champions and other coalition members donate their time and visit clinician offices to distribute patient resource materials (e.g., pamphlets and videos on pain management), and many provide on-the-spot brief education and training to clinicians about opioid prescribing practices. In addition, state and local websites are used to provide open access to host of prescriber and patient education tools, resources, and materials.

4.3.2 Goal 2: Increase Use of the Controlled Substance Prescription Monitoring Program

A major cornerstone of the Arizona Rx Drug Initiative involves raising awareness of the state CSPMP and encouraging prescribers and pharmacists to sign up and utilize the system as a mechanism to ensure patient safety. To accomplish this at the state level, email blasts and website banners are used on the major regulatory board websites (e.g., the Arizona Board of Pharmacy, the Arizona Medical Board, the Arizona Board of Osteopathic Examiners) to encourage use of the system as a best practice standard. Core group members and coalitions also work together to encourage professional associations (e.g., the Arizona Pharmacy Association, the Arizona Osteopathic Medical Association), insurance companies, and retail pharmacies to encourage use of the system by their providers. The

state administrator of the CSPMP from the Arizona Board of Pharmacy also conducts detailed in-person trainings on registration and use of the system throughout Arizona on an on-going basis.

At the community level, medical champions and other coalition members reach out to medical professionals working in private practice, hospitals, and pharmacies using a “Sign up to Save Lives” campaign to provide information on how and why to sign up for the system. These activities range from individualized letters, postcards, flyers, newsletters, a door-to-door approach, and thank you letters for prescribers and pharmacists who have signed up to use the system. To maximize community outreach attempts, core group members from the Arizona Board of Pharmacy and the Arizona Criminal Justice Commission work with the coalitions to provide monthly updated lists of prescribers not yet signed up for the system and to monitor progress on the percentage of all prescribers currently signed up to use the system.

4.3.3 Goal 3: Increase awareness of individualized prescribing habits.

In an effort to increase prescriber’s awareness of how their individual prescribing habits are contributing to the prescription drug misuse and abuse epidemic in Arizona, the Arizona Board of Pharmacy sends unsolicited CSPMP report cards to each prescriber in the counties participating in the Arizona Rx Drug Initiative. Identified as a best practice by the Brandeis University Prescription Drug Monitoring Program Center for Excellence (2014), the reports include the number of prescriptions and pills prescribed by the prescriber and filled for hydrocodone, oxycodone, benzodiazepines, carisoprodol, and other pain relievers during the previous three months and compares the prescriber’s practices to others with the same specialty type who are working in the same county. The prescriber also receives an overview of their prescribing habits for the same set of controlled substances during the past year, as well as a “flag” if they are deemed outliers (i.e., 1, 2, or 3 Standard Deviations above the mean) in their prescribing habits relative to colleagues of their specialty type within their geographic region. These controlled substances were selected based on CSPMP data that showed that large amounts of these substances are being prescribed in Arizona. Additionally, they were selected for inclusion in the unsolicited reports because of the recognition that the combination of pain medications, anti-anxiety medications, and muscle relaxers are what Joseph Rannazzisi, Deputy Assistant Administrator for the Drug Enforcement Administration called the “holy trinity” of controlled substances in his testimony to the House Subcommittee on Commerce, Manufacturing, and Trade, Committee on Energy and Commerce in 2012. When taken together, these three prescription medications significantly increase the risk of potential harm to the user. The use of unsolicited reports to prescribers is intended to be a prescriber feed-back system that allows them to easily monitor their prescribing habits and self-correct any potential over-prescribing of controlled substances.

4.4 STRATEGY 3: ENHANCE RX DRUG PRACTICE AND POLICIES IN LAW ENFORCEMENT

4.4.1 Goal 1: Provide education and training for law enforcement officers.

As mentioned previously, law enforcement in Arizona has struggled with effective mechanisms for handling the complex and costly nature of prescription drug diversion investigations. One solution for tackling this problem has been the dissemination of an Rx Drug Diversion Crimes Training to law enforcement officers across the state. The Arizona Rx Drug Initiative partnered with the Arizona High Intensity Drug Trafficking Area (HIDTA) training department director, to develop and implement an Arizona Peace Officer Standards and Training Board certified prescription drug course for law enforcement officers. This training provides information on strategies and step-by-step guidelines for

law enforcement officers who want to expand their knowledge of effective pharmaceutical drug diversion investigations. Topics covered include prescription drug trends, drug identification, forged prescriptions, diversion in a medical facility, over prescribing cases, doctor shopping, internet pharmacies, and case studies. The core group member and state CSPMP administrator from the Arizona Board of Pharmacy attends these trainings to provide in-depth information on use of the system in diversion investigations. The trainings are made available in local regions or at the state-of-the-art HIDTA training center, and more recently, via remote connectivity.

4.4.2 Goal 2: Increase use of the Controlled Substances Prescription Monitoring Program.

In addition to the formal trainings, other state and local level efforts also involve promoting law enforcement use of the CSPMP to effectively monitor, investigate, and prosecute diversion crimes. At the state level, the push is made through major law enforcement committees and associations (e.g., Arizona Chiefs of Police, Arizona Prosecuting Attorneys' Advisory Council, Arizona County Attorney and Sheriff's Association) and through direct requests from the Commissioners and the director of the Arizona Criminal Justice Commission. In addition, the Arizona Criminal Justice Commission leverages their role as the state administering agency for Edward Byrne Memorial Justice Assistance Grant by requiring law enforcement agencies that are funded by ACJC to participate in multi-jurisdictional task forces to have at least one sworn officer from each funded agency signed up to use the CSPMP. At the local level, the coalitions work through their law enforcement champions to gain buy-in for local law enforcement to sign up and use the system.

4.4.3 GOAL 3: Improve Coding Structure of Data Management Systems for Tracking Rx Drug Offenses.

Data from partner agencies such as prescription drug monitoring data (i.e., controlled substances dispensed), hospital data, emergency department data, poisoning data (i.e., drug overdoses) and DUI-Drug arrest data have effectively been used to illustrate the scope of the prescription drug problem in Arizona. What is less well known is the collateral impact of prescription drug misuse and abuse on crime in our communities (e.g., pharmacy robberies and burglaries, home invasions, etc.). To better understand prescription drug-related crime, law enforcement agencies in local communities are charged with developing a coding structure that would flag crimes that had a prescription drug nexus.

4.5 STRATEGY 4: INCREASE PUBLIC AWARENESS AND PATIENT EDUCATION ABOUT RX DRUG MISUSE.

4.5.1 Goal 1: Create a sense of urgency in the general public about the risks of Rx drug misuse.

The coalitions use a wide variety of community education messaging and materials to increase the awareness of the risks of drug misuse and abuse. Various traditional and social media and material methods are branded with the Arizona Rx Initiative logo (see the prescription bottle on the title page) and are used to create a “surround sound” effect and a sense of urgency in the community. These include: patient safety toolkits, pamphlets, flyers, posters, television, radio, print media, Facebook, Twitter, newsletters, postcards, PowerPoint presentations, “elevator speeches,” videos, parent-child talk kits, and website repositories. Target audiences span a vast range from the general public to specialized groups including parents, grandparents, youth, older adults, adults working with children, pain patients, general patients, and perinatal groups. Modes of dissemination beyond the media include community events, public libraries, pharmacy and healthcare offices, hospitals, and schools. To increase the “stickiness” of the messaging, core group members from Prevention Works, LLC and the Arizona Criminal Justice Commission work with the coalitions on ways to use compelling

localized data and message types that will resonate with the different audiences and specialized groups.

4.5.2 Goal 2: Implement the Rx 360° (Drug Free America, research-based) curriculums to educate youth, parents, grandparents, and other community adults about the risks of Rx drug misuse and how to teach youth strategies that increase their resilience to Rx drug misuse.

To further raise awareness of the prescription drug misuse problem in Arizona, core group members from the Arizona Criminal Justice Commission and Prevention Works, LLC modified an existing research-based prevention curriculum from the Partnership for DrugFreeKids (i.e., the Parents360 and Youth360 components of the Pact360 Suite), and tailored it to Arizona and the prescription drug misuse issue. Four modules of the curriculum currently exist: (1) middle school youth; (2) high school youth; (3) parents (or other guardians); and (4) the general community audience and/or adults who do not currently have school-age children. Adaptations to the national curriculum included the use of localized data (all modules), discussion of resistance strategies from Arizona State University's Keepin' it REAL© curriculum (parent and youth modules), and the inclusion of the previously mentioned parent-child talk kit (parent module).

Prevention Works LLC conducts a Speaker's Bureau training for community-based substance abuse coalition members and their partners. These speakers each receive a training packet that includes a facilitator's guide, PowerPoints, scripts, accompanying videos and handouts, and evaluation forms. The coalition members conduct outreach with schools, youth-serving organizations, family-serving organizations, worksite initiatives, home-visiting programs, probation departments, hospitals, and local businesses to line up the appropriate presentation venues for the trained speakers to present the information to adults and youth in their areas.

4.6 STRATEGY 5: ENHANCE ASSESSMENT AND REFERRAL TO TREATMENT

4.6.1 Goal 1: Increase awareness about substance abuse screening models, treatment options, and how to access treatment services.

Although the Arizona Rx Drug Initiative largely focuses on prevention strategies and related action items, the interconnection between the previously mentioned strategies and issues surrounding access to treatment is critical. Raising the awareness of the risks of misuse and abuse and creating behavior change around access to prescription drugs creates a simultaneous need for a subset of the population already chemically dependent on prescription drug opioids to have access to substance abuse treatment options. For the Arizona Rx Drug Initiative, the primary objectives around treatment involve equipping clinicians with substance abuse screening tools and providing information to help navigate patients through available treatment options.

Core group partners from the Governor's Office of Children, Youth and Families and from the Department of Health Services created a suite of screening tools, treatment locators, information on Medically Assisted Treatment, funding specific decision-trees for navigating behavioral health systems, and options for accessing treatment under the Affordable Care Act. The state is currently piloting a screening, brief intervention and referral to treatment tool (SBIRT) in the northern part of Arizona. This tool allows clinicians to quickly screen for substance use, identify appropriate level of treatment, and refer those in need to more extensive treatment including specialty care services. Other screening options include the Opioid Risk Tool (ORT) and the Screener and Opioid Assessment for

Patients with Pain (SOAPP-R). In addition, the state is currently working on material to promote the use of the Substance Abuse and Mental Health Services' Treatment Locator Website to help patients find locally available treatment options. At the local level, the aforementioned tools and resources are disseminated to primary care offices, healthcare clinics, hospitals and emergency departments, trauma centers, and other community settings that provide opportunities for early intervention with at-risk substance users.

5 THE PILOT PROJECT IMPLEMENTATION

5.1 SELECTION OF THE PILOT SITES

Given the scarcity of funds and the uncertainty of the untested model, the core group decided that an initial pilot phase of the model in three of Arizona's fifteen counties would be the most fiscally responsible way to determine if the model would be efficacious enough to pursue funds to take it to scale across the state. Selection of the pilot sites involved three criteria: (1) data-driven evidence of a significant prescription drug misuse problem; (2) demonstrated willingness by county stakeholders to use data-driven-decision-making; and (3) the capacity for implementing all five strategies by a strong multi-disciplinary, community-based substance abuse coalition that included identified champions from law enforcement, medical, treatment, and prevention/education communities.

The model was presented to coalition leads, who in-turn, presented the model to their coalition members for consensus on piloting the model. Like the state agencies involved, the coalitions agreed to participation in the pilot despite no appropriated funding to support the activities that would be required for implementation. With only the promise of technical and data assistance, small amounts of money where state partners had them available, and support helping them to seek additional grant funds, the coalitions agreed to leverage existing resources and those of coalition members and community stakeholders to support their efforts. In and of itself, the coalitions' willingness to partner on this unfunded effort speaks volumes about the dedication, motivation, and passion of these coalitions for promoting safe and healthy environments in their communities.

Three pilot site counties were initially chosen to implement the model; however, despite considerable effort made by the local substance abuse coalition, the Arizona Substance Abuse Partnership members, and other core group members, one county had difficulty coordinating sectors and was unable to find sector-based champions in law enforcement and the medical community who were willing to endorse and commit to the full implementation process. Given the urgency to roll out the pilot project, the core group chose a different county that met the selection criteria and was capable of rolling out the model immediately. The official sites for the pilot project described here-in included Yavapai County, Pinal County, and a conjoint effort in Graham and Greenlee Counties. The combined geographies of the latter site was a function of the small population size and feasibility of expected coordination, as well as the shared membership across the two neighboring county coalitions. Although not part of the selection criteria, all three sites had a strong history of efficacious community outreach and substance abuse prevention programs and had previously worked on some type of effort involving prescription drug misuse prevention. Essentially, the implementation of the Arizona Rx Drug Initiative became a mechanism to further strengthen and expand existing efforts of the coalition and complement them with new and evolving strategies operating at the state and local levels.

5.1.1 The community substance abuse coalitions

5.1.1.1 Yavapai County: MATFORCE Coalition

Yavapai County is a rural county in Central Arizona with a population of 215,133. Spanning 8,125 square miles, the county is roughly the size of the state of New Jersey and has nine incorporated communities and over thirty unincorporated communities. With 17.8 percent of the population under 18 years of age and 27.4 percent age 65 plus, the county has a smaller than average “working” age population. Yavapai County has two Indian Reservations, the Yavapai Apache Nation in the Verde Valley and the Yavapai Prescott Indian Tribe on the Prescott area. The Native American population accounts for 2.1 percent of the total population, 81.3 percent of the population is Caucasian and 14 percent of the population is Hispanic or Latino.

MATFORCE was formed in 2006 when a group of concerned citizens and community leaders came together to address the methamphetamine problem in Yavapai County. In 2007, the organization made the decision to expand its mission to address all legal and illegal drugs abused in the community. Today MATFORCE is a coalition of over 300 members from multiple sectors of the community who work together implementing multiple strategies with the vision of reducing drug and alcohol abuse. In February 2014, MATFORCE was awarded the 2013 *Got Outcomes Coalition of the Year* from CADCA (Community Anti-Drug Coalitions of America) for its work and the related reductions in underage drinking and prescription drug abuse. MATFORCE implements a variety of strategies ranging from providing substance abuse education for youth and parents to changing policies. The coalition provides services to the entire county, under the following mission statement: *“With determination and integrity, we, the citizens of Yavapai County, commit to working in partnership to build healthier communities by striving to eliminate substance abuse and its effects.”*

5.1.1.2 Pinal County: The Pinal County Substance Abuse Council (PCSAC)

Pinal County, spanning 5,374 miles is home to 389,350 residents and is larger than the State of Connecticut, with 12 incorporated and several unincorporated communities within its borders. The county is located in the central part of Arizona and contains parts of the Tohono O’odham Nation, the Gila River Indian Community, and the San Carlos Apache Indian Reservations, as well as the entirety of the Ak-Chin Indian Community. In both economy and geography, Pinal County has two distinct regions. The eastern portion is characterized by mountains with elevations to 6,000 feet and copper mining. The western area is primarily low desert valleys and irrigated agriculture. The majority of the population is White (83.3 percent), with 6.8 percent of the population Native American, and 4.8 percent African American. The total population is 59 percent Hispanic or Latino.

The Pinal County Substance Abuse Council began as the Pinal County Methamphetamine Abuse Coalition on September 22, 2006 as part of a state-wide effort to help communities combat methamphetamine abuse. In 2011 it underwent a transformation into the Pinal County Substance Abuse Council, in order to broaden the scope of work to include underage drinking and other drug abuse. Membership includes representation from nine community coalitions across Pinal County, plus the Pinal County Department heads/representatives interested in drug prevention (e.g., Probation, Public Health, and County Attorney), and stakeholders such as the Regional Behavioral Health Authority. The coalition provides services to the entire county, under the following mission statement: *“Through collaboration with key community stakeholders, the Council works to reduce substance abuse across Pinal County through policy development, prevention and education.”*

5.1.1.2.1 The Casa Grande Alliance

Of the nine coalitions involved in the Pinal County Substance Abuse Council, the Casa Grande Alliance took the lead on the implementation of the Arizona Rx Drug Initiative model. This coalition provided content material, implementation guidance, and a coordinator who helped implement action items throughout the county, with a particular concentration in the city of Casa Grande. The Casa Grande Alliance began in 1989 as part of the national prevention coalition movement and the Healthy People 2000 campaign. The 2014 membership includes over 50 individuals and agencies representing youth, parents, business, law enforcement, schools, faith-based organizations, youth-serving organizations, government, health care, substance abuse treatment, civic organizations, and the media. In 2011, the Casa Grande Alliance was recognized by President Obama as Champions of Change and National leaders in drug use prevention. The Casa Grande Alliance coalition provides a framework for organizations, families, and individuals to address substance abuse issues in the community. The non-profit, CGA Inc., provides program and administrative staff to support community-driven and evidence-based efforts involving prevention education and awareness, treatment resource information, and a family strengthening program. The coalition serves the city of Casa Grande under the following mission statement: *“Creating partnerships and working together to reduce substance abuse and violence among youth and adults.”*

5.1.1.3 Graham and Greenlee Counties: The Graham County Substance Abuse Coalition and the Greenlee County Substance Abuse Coalition

Spanning 4,641 miles, Graham County is a rural community located in Southeast Arizona and contains a portion of the San Carlos Apache Indian reservation. Bordering New Mexico to the east, it is a fairly mountainous region with high desert terrain and can be best described as a mining and farming community known for the four c’s: copper, cotton, climate, and cattle. With a little over 37,000 people, Graham County is the third least populated county in the state of Arizona, and like most rural portions of Arizona, it is comprised of fairly small and isolated towns with predominately working-class families. The Native American population accounts for 14.4 percent of the total population, 72.1 percent of the population is White and 30.4 percent of the population is Hispanic or Latino.

The Graham County Substance Abuse Coalition originally formed in 2003 as a five person group of concerned citizens wanting to address the growing methamphetamine problem in the community. As recognition of the coalition's promising work grew, community buy-in began to develop and by 2005, the budding coalition became a go-to resource for citizens concerned about multiple substance use issues in the community. As a result, the coalition broadened the scope of its mission to include multiple substances, and developed relationships within various sectors of the community. The coalition is currently 37 members strong and serves the entire county under the following mission statement: *“A substance abuse prevention community coalition that provides resources, support and education to the community through prevention and intervention to reduce substance abuse with a primary focus on reducing youth substance use.”*

Greenlee County is the least populated of all Arizona Counties, with a population of 9,049 covering 1,848 square miles. Located in Southeast Arizona directly bordering New Mexico, the majority of the land is government owned by the Forest Service (63.5 percent), the Bureau of Land Management (13.6 percent), and the State of Arizona (14.8 percent). Like neighboring Graham County, Greenlee County is considered a mining and farming community with the majority of the county economy supported by the Morenci Mine – the largest copper mine in North America. The majority of the

population is White (77.2 percent) and close to half of the population (47.9 percent) is Hispanic or Latino.

The Greenlee County Substance Abuse Coalition originally started in 2005 as the Meth Task Force and focused on methamphetamine prevention and education within Greenlee County communities. After a brief period of inactivity, Southeastern Arizona Behavioral Health Services (SEABHS) re-engaged community members to re-establish a broader drug prevention coalition in 2010. Since then, the coalition has been meeting monthly with regular attendance, growing membership, and renewed enthusiasm in alcohol, prescription drug, and other drug misuse and abuse prevention efforts. The 25 members of the coalition provide services throughout the county under the mission statement: *“To prevent alcohol and drug abuse among individuals, youth, and families through education and activities that help empower individuals to develop healthy attitudes, and to thrive and succeed.”*

5.2 IMPLEMENTATION PROCESS

5.2.1 Staggering the Roll Out

The timing of the roll out into the three pilot sites was strategically planned to include a staggered approach, with each county beginning three months apart. The purpose of this method was three-fold: (1) from a feasibility perspective, it allowed the state to concentrate efforts in one region during the critical, early stages of each initiation; (2) it allowed coalitions that needed more time to build capacity the opportunity to do so; and (3) it allowed the core group and the next site to gain valuable lessons learned from the previous site before beginning. The coalitions determined the order of readiness, with Yavapai going first, followed by Pinal, and finally Graham/Greenlee. Each pilot site committed to a one year implementation, for a total pilot period of 18 months spanning July 1, 2012 to December 31, 2013.

5.2.2 Town Halls

The work in each county began with a “Town Hall” approach to raising awareness of the prescription drug misuse and abuse problem in each pilot community. These meetings were hosted by the coalitions, and they included a wide variety of local leaders, potential partners, community stakeholders, and concerned residents who wanted to learn more about the Initiative and who were willing to be part of the solution. In order to maximize leveraged resources and partners and to ensure viable delivery modes for the action items, each pilot site made strategic invitations to representatives from local hospitals and emergency departments, primary care offices and healthcare clinics, pharmacies, substance abuse treatment facilities, schools, youth-serving agencies, local media, adult and juvenile probation, the County Attorney’s Office, the County Sheriff’s Office, local police precincts, and drug task force members.

Core Group members facilitated the town hall by leading a discussion about the pervasiveness of the local problem and walking attendees through the suggested action plan. Community-level buy-in was reached for each step in the action plan, and commitments for implementing specific action items were made by the attendees. These commitments ranged from volunteered and in-kind financial donations, volunteered time, coordination leadership and assistance, access to particular populations (e.g., youth, parents, administration, staff), meeting venues, technical and content expertise, and new or expanded taskforce and subcommittee formation for medical, law enforcement and community outreach efforts. The level of momentum generated in these meetings was nothing short of contagious

and the genuine collaborative nature within community and between state and community partners set the stage for a successful implementation.

5.2.3 Flexible Implementation

The coalitions were advised to maintain fidelity and consistency in implementing the five strategies and corresponding goals and objectives; however, it was also critical to recognize and respect the unique characteristics – geographic, demographic, and coalition style - of each site. This was accomplished by allowing flexibility in the execution of most action items, a process that the coalition leaders in the three sites endearingly came to call, “same dish, different recipe.” This approach paid considerable dividends, as the repository of available material, modes, venues, and dissemination ideas rapidly grew into a sizeable collection, allowing the coalitions cross-access to a variety of creative, successful and most importantly, readily available materials.

5.2.4 Taskforces and Champions

As the coalitions moved through implementation of the five strategies throughout the pilot year, each site utilized their sector champions in different ways, Yavapai County formed medical and law enforcement taskforces that met consistently to discuss action items for Initiative strategies two and three, respectively. Yavapai County also had a powerful medical champion that was a retired family physician and former pharmacist. This particular individual not only did a considerable amount of peer-to-peer outreach with local hospitals, prescribers and pharmacists, but made efforts to work with state regulatory boards, associations, and the state’s legislature to further the work. Likewise, the coalition was able to use AmeriCorps funds to hire a part time staff dedicated to implementing the Rx360 curriculums in the schools. This individual worked tirelessly to coordinate with the local schools and bring the curriculum to almost 7,000 youth in Yavapai County alone. Her efforts were complimented by several other volunteer champions and public health educators that also helped spread the message to the parent and adult community.

Pinal County also created a medical taskforce. This group consisted primarily of hospital clinicians from the local hospital in the city of Casa Grande and focused on Initiative strategies two and five. Later, two clinicians from hospitals in other parts of the county joined the group, with one of these clinicians becoming an incredible champion for emergency department policies and procedures for prescribing opioids on a system-wide basis for the statewide hospital group he was affiliated. A pharmacist champion was found in a local resident who worked at the corporate level of a major pharmacy chain and who became critical for the creation and dissemination of the *Arizona Guidelines for Dispensing Controlled Substances*. Additional powerful champions included the public health educator from the county public health department who worked diligently to incorporate the Rx360 curriculum into her school-based education outreach programs and the staff coordinator whose time was generously paid for by the Regional Behavioral Health Authority serving the county (i.e., Cenpatico). The latter individual not only conducted considerable messaging and education outreach efforts into the community, but developed and implemented a door-to-door approach to bring awareness and resources to the local prescribers within the city of Casa Grande.

Yavapai and Pinal County law enforcement task forces focused on drop box placement and diversion crimes, with Pinal County leveraging an existing county-wide law enforcement group for similar work. In both counties, major law enforcement champions included the County Attorney, the County Sheriff, and local police chiefs. These influential champions – those with decision-making ability – were critical for moving the actions items in Initiative strategy three forward.

In Graham/Greenlee Counties, the local champions included a pharmacist and nurse practitioner heavily involved in peer-to-peer outreach and education in the community and guidance within the coalition for implementation of action items involved with Initiative strategy two. The county coroner was also a major champion, and became a public voice for cautioning prescribers against over-prescribing, as well as for community-based public service messaging and education. Law enforcement champions include local police chiefs, Sheriff's Office representatives, and Department of Public Safety officers who coordinated the law enforcement training and provided assistance with public service messaging and outreach.

In all three pilot sites, the most powerful champions of all were without a doubt the three coalition leads. These three leaders in their communities were essential to the success of the Initiative. They were the masters of coordinating partners, the artists behind the message development, and the heart that kept the largely unfunded project going on the ground. They were open and willing to try new things, knew how to leverage resources and make minimal funds count, and most importantly – they were experts in community-level substance abuse prevention. The coalitions are often referred to as the “vehicle of change” in the Initiative, and these three were absolutely the drivers of those vehicles.

5.2.5 Synching the State and Local Level Collaboration

In order to ensure coordination between state and local-level implementation, a research analyst from the Arizona Criminal Justice Commission was assigned as the project coordinator and worked as a liaison between the core group and the community coalitions. The project coordinator had previous experience working on large scale prevention campaigns and an array of translational research and quantitative skills. The coordinator's primary role involved providing technical assistance on the implementation of the Initiative's goals, objectives, and action items, ensuring fidelity to the model, and helping the coalitions identify solutions to any obstacles or resources gaps encountered. To accomplish this, the project coordinator actively participated in multiple community-based meetings to discuss local and state level implementation methods, ongoing progress, and feedback on how the local and state level methods were affecting the community. Typical meetings across the three sites included: the monthly coalition meetings, board meetings, taskforce meetings, steering committee meetings, invited speaking engagements, trainings, and community events. The most critical of these meetings was the quarterly, and sometimes more frequent, cross-coalition collaborative meetings. These meetings brought the coalition leads together for an in-depth discussion of implementation experiences, sharing materials and ideas, and to identify any obstacles to implementation. The project coordinator was responsible for taking the lessons learned from all of the meetings back to the core group for review and discussion and feeding the response, suggestions, and available resources back into the community. The feedback loop between the two levels was paramount to the collaborative nature between the state and the communities and the overall success of the Initiative.

A strong component of the technical assistance involved teaching the coalitions effective methods for using data-driven-decision-making in their work. This included helping the coalitions package local data findings to develop persuasive community messaging, making compelling asks for key stakeholder and partner buy-in, and illustrating the need for behavior change in various target audiences. In addition, evaluation data was examined by the project coordinator on an ongoing basis to help the coalitions identify progress towards meeting target numbers and objectives in the action plan. This included process evaluation measures and available impact data, including data from the CSPMP and event-driven trainings. The project coordinator reviewed these data with coalition leads during the aforementioned cross-coalition collaborative meetings and discussed ideas for effectively managing implementation obstacles. These data were also supplied at monthly coalition meetings to

celebrate success, reinforce efforts, and maintain momentum. To assist the coalitions in their broader work, the project coordinator also played an active role in helping the coalitions conduct community assessments and strategic planning sessions to identify at-risk populations, geographic hotspots, specific contextual factors driving substance abuse problems in their communities, and the potential for return-on-investment of specific strategies.

5.2.6 General Overview of the Implementation

5.2.6.1 The Community Level

In all three pilot sites, each sector simultaneously began movement on drop box installations, general risk messaging, and scheduling a Speaker's Bureau training on the Rx360 curriculums. To ensure fidelity to the model, the Arizona Criminal Justice Commission provided in-kind funds to pay for the time and travel of the statewide trainer from Prevention Works, LLC to conduct the training in each site. The state project coordinator also attended each training to provide consistent information about how the curriculum implementation fit within the broader Initiative as well as evaluation and data collection guidance. Subsequent outreach to schools and community venues to schedule the youth and parent modules followed and remained ongoing throughout the pilot period. Promotion of proper storage and disposal was the next step, with new drop box locations added to awareness materials on an ongoing basis and marketing of take-back events occurring per event. Coordination with hospitals and emergency departments followed shortly thereafter to ensure use of the best practice guidelines, and community prescriber and pharmacist outreach continued on an ongoing basis to promote use of the CSPMP, educational resources, and substance abuse screening tools. Each site also worked with the state core group members to schedule one Rx Drug Diversion Crimes training for local law enforcement and one Best Practice Training for prescribers and pharmacists in their communities. As mentioned in the previous strategy section, a variety of modes and target audiences were used in all community education and awareness messaging and materials, as well as in prescriber and pharmacist outreach efforts.

5.2.6.2 The State Level

At the state level, the first steps involved developing and disseminating the best practice guidelines described in the previous strategy section, as well as the prescriber report cards for the Initiative counties. This process involved the local medical champions and data analysts from the Arizona Board of Pharmacy and the Arizona Criminal Justice Commission working together to design a template that clearly illustrated individual prescribing patterns and algorithms for flagging outliers. Additional immediate efforts involved marketing the use of the CSPMP through email blasts and in-person trainings provided by the Arizona Board of Pharmacy. Based on feedback from the community, substantial efforts were made to streamline the registration process for the CSPMP, including eliminating paper/notary requirements and moving instead to an electronic registration, as well as eliminating the short tutorial required before gaining full access to the system. The Arizona Board of Pharmacy also worked with the National Association of Boards of Pharmacy to connect Arizona into the hub system for inter-state connectivity and allowing Arizona prescribers and pharmacists the ability to query other man other state systems when presented with patients coming from areas outside of the state. Members of the core group also worked independently and sometimes in conjunction with the medical champions of the coalitions to gain endorsement from regulatory boards, professional associations, and insurance companies to further promote prescriber and pharmacist use of the CSPMP.

Members of the core group also conducted various types of awareness and education efforts on the problem of prescription drug misuse in Arizona and the steps being taken to combat the problem. These efforts ranged from networking and formal presentations at local, state and national conferences, hospitals, health centers, health care provider agencies and associations, with prescriber and pharmacy students, local and state public health and behavioral health prevention groups, law enforcement councils and associations, drug taskforce groups, probation committees, and other local substance abuse coalitions in the state who were interested in hearing about the model. As the Initiative unfolded, the model was also presented at national venues, including the National Criminal Justice Association, the Justice and Research Statistics Association, the Centers for Disease Control, the Association of State and Territorial Health Officials, the Community Anti-Drug Coalitions of America annual conference, the Bureau of Justice Assistance's Prescription Drug Monitoring Programs Technical Training and Assistance Center conference, and the SEARCH National Consortium for Justice Information and Statistics Membership Meeting. In August of 2013, the Arizona Rx Drug Misuse and Abuse Initiative was awarded the Outstanding Criminal Justice Program Award: Western Region by the National Criminal Justice Association for self-sustaining criminal justice programs that showcase successful promising practices in criminal justice.

5.2.7 Funding, Expansion and Sustainability

As mentioned previously, the Arizona Rx Drug Initiative started with no appropriated funding and relied heavily on the partners' ability to leverage resources. At the state level, the Arizona Criminal Justice Commission provided funds to hire the analyst position at the Arizona Board of Pharmacy to work on the prescriber report cards and other CSPMP data. ACJC also provided start-up funds for immediate training and printing needs and allocated two staff positions – the full-time project coordinator and an additional half-time data analyst – to help get the Initiative started. Beginning in the 2013 fiscal year, ACJC was awarded a grant from the Parent's Commission on Drug Education and Prevention to support these positions and provide some additional funds to cover materials, trainings, travel, and some operating costs of the coalition efforts. Additional monetary support came from the Arizona Department of Health Services to cover the costs of developing and disseminating the emergency department guidelines and the parent-talk kits that accompany the Rx360 curriculums. All other core group partners donated their time for the previously mentioned meetings, trainings, and outreach efforts.

At the local level, the coalitions also leveraged members and partners for their time and financial support. These efforts included working with the Partners Against Narcotics Taskforce (Yavapai) and the County Attorney and County Sheriff's offices (Pinal) to fund drop boxes; in-kind media donations to run public service announcements and other ads or talk spots (all three sites); local businesses to provide venues and donated food for trainings (all three sites); and donated community volunteer and staff time to develop materials and disseminate the Rx360 curriculums (all three sites). Additional support in Yavapai County included leveraging AmeriCorps funds to support a part-time staff person to implement the youth Rx360 modules and donated staff time from the Arizona Attorney General's Office to assist in the youth Rx360 implementation and some community data collection efforts. Leveraged resources in Pinal County included funding from the Regional Behavioral Health Authority (i.e., Cenpatico) for the full-time county coordinator and implementation of the youth Rx360 modules by the Pinal County Public Health Department. For Graham and Greenlee County, materials were leveraged through funding from Safeway, Walgreens, Wal-Mart, and Thriftee.

At the end of the pilot period, each pilot site expressed interest and commitment for continuing the work on the Initiative. For added support, each coalition received competitive grant funds from the

Parent's Commission on Drug Education and Prevention that included work on the Initiative strategies. The Arizona Criminal Justice Commission also received renewal funding to continue supporting the coalitions. Once the coalitions secured their own independent funding, the ACJC funding was reallocated to continue providing technical assistance to the existing counties, to ready materials for a statewide implementation, and to expand the work into Mohave County starting July 1, 2014. In October of 2013, the Arizona Department of Health Services was awarded the Strategic Prevention Framework, Partnership for Success Grant from SAMHSA to address underage drinking and prescription drug misuse. Starting in January of 2014, these funds have helped support some of the strategies for ongoing efforts in Yavapai and Mohave County and new efforts in Navajo County. Additional roll out of the SPF-PFS funds in 2015 will help assist implementation in the southern regions of Arizona, including ongoing efforts in Pinal, Graham, and Greenlee Counties. ACJC also recently received funds from the Bureau of Justice Assistance: Harold Rogers Prescription Drug Monitoring Program Grant Program to expand the Initiative into Arizona's most populated county – Maricopa County. Two new Drug-Free Communities grantees in Arizona this year also wrote the Initiative model into their grant applications. These efforts will support continuing work in Graham County with specific expansion into the Native American population and new efforts in La Paz County. Other coalitions throughout the state have also begun using their Parent's Commission for Drug Education and Prevention funds and their existing Drug-Free Communities grants to implement strategies involving proper storage and disposal and community awareness, and are beginning to look at ways to include prescriber and pharmacist outreach. These efforts have largely occurred in Apache, Navajo and Pima Counties.

6 EVALUATION RESULTS: PILOT PROJECT AND CURRENT INITIATIVE

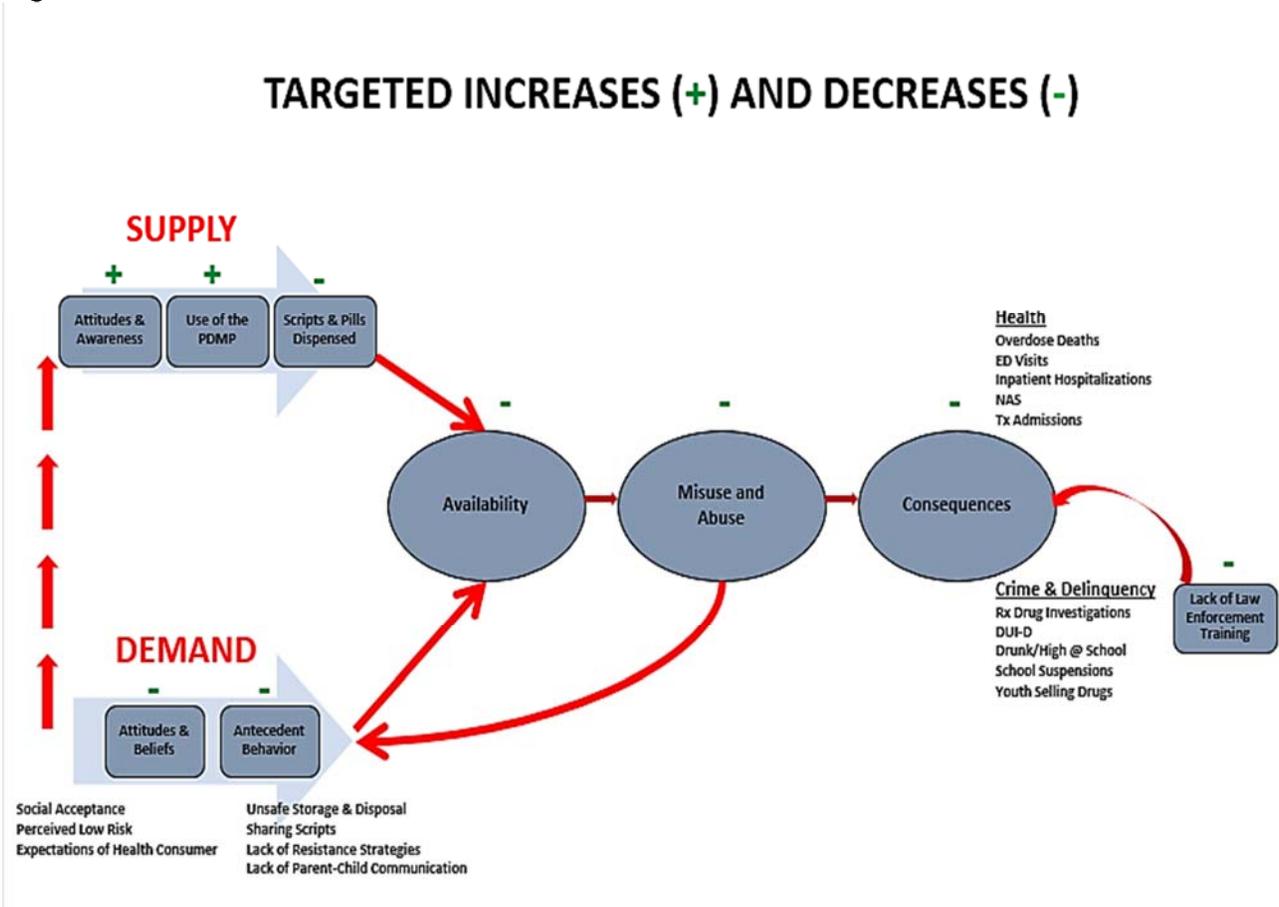
6.1 THE EVALUATION FRAMEWORK

The Arizona Rx Drug Misuse and Abuse Initiative was constructed predominately as a public health model and accordingly follows the framework used in public health evaluation. A basic pre-post design and a mixed-methods approach is used to track and analyze process, impact, and outcome measures and establish the breadth, depth, and efficacy of the goals, objectives, and action items used during the implementation of the Arizona Rx Drug Initiative action plan (see Figure 2). The majority of impact and outcome measures are quantitative data, with supplemental qualitative data used to explore program implementation obstacles and particular impact results for the purpose of improving programmatic efforts. In general, two types of analyses are used in the Arizona Rx Initiative evaluation: (1) basic percent change over time; and (2) between group comparisons.

Keeping consistent with the leveraged resources centerpiece of the Arizona Rx Drug Initiative, staff from the Arizona Criminal Justice Commission's, Statistical Analysis Center took on the evaluation of the model in order to maximize the use of all available resources towards programmatic work. To minimize costly data collection, the evaluation measures were primarily chosen from existing, reliable and valid, state level data sources that were available on a consistent basis. Additional survey instruments, key-informant, and focus group protocols were developed by the evaluation team to test the efficacy of the event-based trainings and exploration of impact measures and implementation experiences (see Appendices 2 and 3 for a comprehensive list of process, impact, and outcome measures, and a detailed list of data sources included in the model).

The results described here-in include process, impact, and outcome measures currently available at the time this report was written and detail the efficacy of the Initiative strategies during the pilot period (i.e., July 1, 2012 to December 31, 2013). Additional cumulative Initiative progress is also detailed where available and appropriate. To reflect the depth and breadth of work implemented at the state and community levels, results are presented in the following manner: (1) Arizona state aggregate; (2) pilot vs. non-pilot counties; (3) the independent pilot sites (i.e., Yavapai, Pinal and Graham/Greenlee Counties), including a subset of specific analyses on the city of Casa Grande to reflect the concentrated effort in this area; and (4) the available data on the newest Initiative site - Mohave County.

Figure 2.



6.2 PROCESS EVALUATION

From the inception of the Initiative, process evaluation measures were collected at the state and local level and tallied on a quarterly basis. To capture the breadth and depth of the implementation, the measures include the number of people reached, the number of events, what was used to reach them and how often they were reached. To avoid unreliable and unfeasible tracking, all process related numbers in the Arizona Rx Drug Initiative evaluation were tabulated as direct contacts – individuals who directly received education, training, messaging, and program material – and do not include estimates of indirect contacts – individuals that may have received program content from the direct contacts of the program. During the pilot period of the Initiative, the reach spread to over half a million people in the three counties, with the majority of the work involving community messaging and

outreach via media and material dissemination (see Table 1 for the number of individuals reached during the pilot period).

Table 1.

Process Evaluation Measures for the Arizona Rx Drug Misuse and Abuse Initiative: Individuals Reached during the Pilot Project (July 1, 2012 - December 31, 2013)				
County	Yavapai	Pinal	Graham/Greenlee	Total
Individuals Trained for Rx360 Speaker's Bureau	42	18	49	109
Rx360 Youth Curriculum	5,859	1,951	818	8,628
Rx360 Adult Curriculum	263	441	204	908
Community Events	9,708	5,096	1,044	15,848
Media/Material Dissemination	287,079	175,749	52,161	514,989
Law Enforcement Training	100	58	30	188
Prescriber/Pharmacist Best Practice Training	41	75	47	163
Prescribers Receiving Report Cards	593	331	77	1,001
Number of Rx Drug Drop Boxes Installed	5	16	0	21
Total Number of Rx Drug Drop Boxes	10	20	7	37
Number of Take Back Events	18	6	2	26
Total lbs Collected	3,762	1,550	789	6,101

The reach has doubled to over a million people throughout the life of the Initiative and continues to grow. Below are highlights of the current Initiative process results occurring within the four Initiative sites, with detailed information provided in Table 2.

- * Over **13,000 youth** have been reached with prescription drug education programming
- * Over **1,500 prescribers** are receiving unsolicited report cards to raise awareness of problematic prescribing patterns
- * Over **300 law enforcement officers** in Arizona have received training and education on prescription drug diversion crimes (260 in Initiative counties)
- * **Over 26,000 people** have attended presentations and community events to hear about the prescription drug misuse problem and the Arizona Rx Drug Initiative
- * Over **900,000 people** have been reached with public awareness and educational materials

Complementing the community level efforts include over 200 presentations made by state core group members throughout Arizona and at the national level, over 3,000 copies of the emergency department and dispenser guidelines printed and disseminated throughout Arizona, and over 10,000 copies of the parent talk-kit printed and disseminated in the Initiative counties. The paid and donated staff time at ACJC allocated to program development, oversight, technical assistance, and evaluation is currently over 8,000 hours and the total funds contributed by ACJC directly and through the Parent's Commission funding to support the Initiative is currently over \$325,000. In addition, the Arizona Department of Health Services contributed over \$100,000 to host consensus meetings and cover printing and dissemination costs, and the community prevention liaison from Prevention Works dedicated 725 hours for trainings, meetings, material, messaging, and toolkit development, with approximately \$40,000 in in-kind time and services to the Initiative. As mentioned previously, each member of the core group from the various agencies also allocated time to meetings, presentations, and outreach efforts.

Table 2.

Process Evaluation Measures for the Arizona Rx Drug Misuse and Abuse Initiative Community Level Action: Cumulative Totals as of October 1, 2014										
County	Yavapai		Pinal		Graham/Greenlee		Mohave		Total	
	# of Events	# Reached	# of Events	# Reached	# of Events	# Reached	# of Events	# Reached	# of Events	# Reached
Individuals Trained for Rx360 Speaker's Bureau	1	42	1	18	1	49	3	77	6	186
Rx360 Youth Curriculum	13	7,844	145	3,929	21	1,325	5	100	184	13,198
Rx360 Middle School	100	505	125	3,488	17	991	2	15	244	4,999
R360 High School	252	1,480	20	441	4	334	4	70	280	2,325
Rx360 Adult Curriculum	15	305	27	531	10	388	2	105	54	1,329
Rx360 Parent	0	0	25	487	9	353	1	20	35	860
Rx360 Community	3	42	2	44	1	35	1	73	7	194
Community Events	324	17,367	45	6,901	9	1,741	0	0	378	26,009
Formal Presentations (non-Rx360)	157	7535	37	5,971	5	245	0	0	199	13,751
"Elevator" Speeches	4	121	1	10	1	800	0	0	6	931
Town Halls/Stakeholder Meetings	3	3	0	0	2	45	0	0	5	48
Other	0	0	7	715	1	651	0	0	8	1,366
Media/Material Dissemination	11	581,572	55	261,253	117	72,801	0	20	183	915,646
Awareness	10	581,568	42	131,964	109	72,789	0	20	161	786,341
General	0	561,786	14	129,464	13	23,900	0	1,100	27	716,250
Parent	0	1,915	5	534	14	1,738	0	0	19	4,187
Parent Talk-Kit	6	152	0	764	4	118	0	170	10	1,204
Storage and/or Disposal	1	4,099	34	40,196	18	6,932	0	0	53	51,227
Senior Citizen	0	0	1	450	32	73	0	0	33	523
NAS	1	16	6	313	5	150	0	0	12	479
PDMP	0	0	7	533	1	43	0	0	8	576
Patient Education	2	7,600	14	2,302	5	150	0	950	21	11,002
Prescriber Education	0	6,000	1	173	3	5	0	0	4	6,178
Other	0	0	6	10,291	14	39,680	0	0	20	49,971
Best Practice Guidelines	1	4	3	100	8	12	0	35	12	151
ED	0	0	3	100	1	3	0	11	4	114
Pharmacy	1	4	0	0	6	8	0	24	7	36
Community	0	0	0	0	0	0	0	0	0	0
Law Enforcement Training	2	100	1	58	1	30	1	72	4	260
Prescriber/Pharmacist Best Practice Training	2	41	2	75	1	47	0	0	5	163
Prescribers Receiving Report Cards	8	593	7	331	6	77	4	509	25	1,510
Number of Hospitals Implementing ED Guidelines	n/a	2 out of 2	n/a	3 out of 3	n/a	1 out of 1	n/a	1 out of 3	n/a	7 out of 9
Door-to-Door Trainings/Contact	78	472	6	83	14	23	0	0	98	578
Community Prescribers	13	25	5	60	4	6	0	0	22	91
Hospital Prescribers	3	59	1	23	2	3	0	0	6	85
Pharmacists	1	150	0	0	6	12	0	0	7	162
Treatment Providers	1	8	0	0	0	0	0	0	1	8
Other	1	1	11	10	2	2	0	0	14	13
Number of Rx Drug Drop Boxes Installed	5	n/a	16	n/a	0	n/a	3	n/a	24	n/a
Rx Drug Drop Box Collection	10 boxes	8,009 lbs	20 boxes	3,905 lbs	7 boxes	663 lbs	3 boxes	609 lbs	40 boxes	13,186 lbs
Rx Drug Take Back Events	38	1,220 lbs	7	329 lbs	3	260 lbs	1	Not Reported	49	1,809 lbs
Total lbs Collected	48 modes	9,229 lbs	27 modes	4,234 lbs	10 modes	923 lbs	4 modes	609 lbs	89 modes	14,995 lbs

6.3 IMPACT EVALUATION

The results reported in this report include data from the pilot period of the project (July 1, 2012 to December 31, 2013) and cumulative data where available. Given the considerable lag in data availability of some measures, not all true pre-post data are yet available. However, given the need for a year-end assessment to determine feasibility, success, and next steps, data were compiled where available and appropriate to assist in this assessment. Full pre-post tests will be conducted on an ongoing basis as the data become available and will be updated in this report moving forward.

6.3.1 Strategy 1: Reduce Illicit Acquisition and Diversion of Prescription Drugs

Proper Storage and Disposal

To assess the effectiveness of installing drop boxes and implementing take-back days, the primary impact evaluation measure involves the total pounds collected between the two venues. During the pilot period (July 1, 2012 to December 31, 2013), the 37 drop boxes and 26 take-back events collectively yielded 6,101 total pounds across the three pilot sites. With continued ongoing efforts in Yavapai, Pinal, Graham and Greenlee Counties, and the addition of three drop boxes in Mohave County, the current tally for the Initiative for the 40 boxes and 49 total take-back events is 14,995 pounds (see Table 2 for details on individual site collection). Given that pounds collected was not monitored consistently prior to the Initiative, it is difficult to gauge a true pre-post type comparison. However, given the 146 percent increase in pounds collected between the pilot period and post-pilot period, and that the majority of this increase was due to the dramatic increase in collection in Yavapai and Pinal Counties (145 percent and 173 percent increases, respectively), it does indicate that community efforts to raise awareness of proper disposal and use of the drop boxes and take-back events is working. More importantly, it indicates that there are currently close to 15,000 pounds of unused, unneeded, and expired medication no longer being kept unnecessarily in the home and no longer available for potential diversion.

At the state level, the more recent push to expand installation of drop boxes outside of the Initiative counties also appears to be working. Prior to the inception of the Initiative, Arizona had approximately 20 drop boxes across the entire state, and almost half were in the pilot counties. Through awareness efforts, coalition work, and financial assistance from the Arizona Attorney General's office, the current total is 117 drop boxes – a 485 percent increase. Feedback from local law enforcement and local coalitions who are installing the new boxes indicates that the installation of the drop boxes serve as a great first step to unify partners and begin creating awareness in the community.

An attempt was made to evaluate the general public's knowledge of proper disposal and storage methods as well as awareness and use of the permanent Rx drug drop boxes and take-back events through a community sidewalk survey. However, due to poor sampling methods (i.e., inability to generate a sample size representative of the county population as a whole and the self-selected bias inherent in sidewalk survey participants), the data proved unreliable and were dropped from the evaluation model during the pilot portion of the Initiative. A randomized sample of the entire population would have been the ideal method to use; however, there were no available funds to conduct a survey of this magnitude.

As a proxy supplement, data from the adult Rx360 curriculums were used to evaluate intended change in proper disposal measures. It should be noted that these data are limited to only those individuals who participated in the curriculum, and not necessarily representative of the population as a whole.

For those adults who participated in the Rx360 curriculum during the pilot period (only the parent curriculum was used during the pilot period), participants were asked to respond to the following statements using a five point Likert scale of agreement on pre-test surveys prior to the curriculum and again on a post-test surveys immediately following the curriculum:

1. I know how to properly dispose of prescription drugs to make sure that kids do not have access to them.
2. I know how to properly store prescription drugs to make sure that kids do not have access to them.

An independent samples t-test of the means indicated a statistically significant improvement in participants’ knowledge of proper disposal and storage (Table 3).

Table 3.

Pre-Post Efficacy Test of the Initial Rx360 Curriculum					
t-test for Equality of Means					
n=693 pre-test; n=682 post-test					
	μ Pre-Pilot	μ Post-Pilot	p value (2-tailed)	% Change in Responses Indicating Agree/Strongly Agree	Significant Increase
Proper Disposal	4.20	4.64	< 0.001	17.68%	Yes
Proper Storage	4.28	4.63	< 0.001	12.66%	Yes

Note: Items were collected using a 5 point Likert scale; 1=strongly disagree, 2=disagree, 3=undecided, 4=agree, 5=strongly agree

Although the increase was acceptable, improvements were made to the surveys following the pilot period in order to move beyond a broad general assessment and instead test specific knowledge gain. In addition, a matched identifier was also added to the survey instruments to increase the robustness of the analytical process. The following four questions are currently assessed on the parent and community Rx360 curriculums:

1. I know where there are permanent drop box locations in my county (five point Likert agree scale)
2. I am aware of prescription drug “take-back” events in my county (five point Likert agree scale)
3. Which of the following is the safest way to store prescription drugs (four item multiple choice)
4. Which of the following is the correct way to dispose of prescription drugs (four item multiple choice)

The initial review of the Rx360 Community module indicates that, at least for community participants in the curriculum, there has been a significant increase in awareness of drop box locations and take-back events (76.7 percent and 55.6 percent, respectively) and in specific knowledge of the correct way to properly store and dispose of prescription medication (see Tables 4 and 5). Again, these results are only preliminary, as the two revised curriculums are currently in the implementation process; however, the initial evaluation does indicate that the Rx360 curriculums are effective for increasing the public’s knowledge and awareness of proper storage and disposal methods of prescription drugs.

Table 4.

Pre-Post Efficacy Test of the Community Rx360 Curriculum (Revised)					
t-test for Equality of Means					
n=79 pre-test; n=54 post-test					
	μ Pre-Pilot	μ Post-Pilot	p value (2-tailed)	%Change in Responses Indicating Agree/Strongly Agree	Significant Increase
Drop Box Locations	2.92	4.81	< 0.01	76.7%	Yes
Take-Back Events	2.76	4.35	< 0.001	55.6%	Yes
Note: Items were collected using a 5 point Likert scale; 1=strongly disagree, 2=disagree, 3=undecided, 4=agree, 5=strongly agree					

Table 5.

Pre-Post Efficacy Test of the Community Rx360 Curriculum (Revised)					
Mann Whitney U-test					
n=79 pre-test; n=54 post-test					
	% Correct Pre-Test	% Correct Post-Test	p value	%Change in Responses Indicating Agree/Strongly Agree	Significant Increase
Proper Storage	45.0	74.1	< 0.001	64.67%	Yes
Proper Disposal	33.8	94.4	< 0.001	179.29%	Yes
Note: Items were collected using a 4 item multiple choice response set					

A final measure used to evaluate the effectiveness of Strategy 1, involves monitoring where youth are obtaining prescription drugs. If attempts to raise awareness and change behavior for proper storage and disposal of prescription drugs are effective, it can be assumed that youth will have less access to prescription drugs in their own homes and from friends getting them from their homes. The evaluation findings support this hypothesis, with a 10 percent decrease in all Arizona youth obtaining Rx drugs from home. Because the assessment of this question on the extant *Arizona Youth Survey* includes asking youth where they obtained them if they have ever used prescription drugs in their lifetime, it is difficult to tease out the magnitude of reduced access during only the Initiative timeframe. As a result, a proxy measure was used to determine Initiative-related success by filtering out data to include only current past 30-day youth misusers of prescription drugs and determining if fewer current misusers were accessing them through friends and family.

Both pilot and non-pilot regions illustrated decreases in youth accessing prescription drugs from friends, with Yavapai, and Graham/Greenlee Counties showing significantly greater decreases than non-pilot counties (45 percent and 52 percent, respectively; see Table 6). The exception to the pattern was Pinal County. An increase was seen at the county overall; however, in the concentrated area of focus in Casa Grande, a significant decrease (29 percent) was demonstrated and rates of access were comparable to Yavapai and Graham/Greenlee Counties. For all three areas, rates of accessing prescription drugs from friends was significantly lower than non-pilot areas and the state overall. Access from family also saw dramatic decreases in all pilot areas (range = 15 to 68 percent reduction), while non-pilot areas saw slight increases (three percent; see Table 7).

Table 6.

Obtained Rx from Friends (Past 30 Day Misusers)				
	2010	2012	2014	% Change (2012-2014)
Yavapai	45.0	36.9	20.4	-44.72%
Graham/Greenlee	41.5	37.7	18.2	-51.72%
Pinal	37.5	28.4	38.6	35.92%
Casa Grande	43.5	27.0	19.2	-28.89%
Non-Pilots	40.1	34.3	31.1	-9.33%
Arizona	40.2	34.0	31.1	-8.53%

Table 7.

Obtained Rx from Family (Past 30 Day Misusers)				
	2010	2012	2014	% Change (2012-2014)
Yavapai	16.2	10.7	7.1	-33.64%
Graham/Greenlee	24.4	16.4	6.1	-62.80%
Pinal	15.6	12.7	10.8	-14.96%
Casa Grande	16.7	17.6	5.6	-68.18%
Non-Pilots	15.8	10.9	11.2	2.75%
Arizona	16.0	11.1	11.0	-0.90%

6.3.2 Strategy 2: Promote Responsible Prescribing and Dispensing Policies and Practices

Increase Use of the of the Controlled Substance Prescription Monitoring Program

The state of Arizona has seen a dramatic increase in the number of prescribers and pharmacists signed up to use the CSPMP since the inception of the Initiative. For prescribers, the numbers have increased 109 percent, moving from 14.7 percent of all prescribers who actively prescribe controlled substances signed up as of July 1, 2012 to 31.3 percent signed up as of November 1, 2014. For pharmacists, the increase has been even more dramatic, with a 307 percent increase and moving from 14.7 percent to 59.7 percent of all pharmacists in Arizona signed up to use the system.

The pilot sites have accounted for a considerable amount of this increase and have demonstrated higher rates of increases and proportion of clinicians signed up relative to their non-pilot counterparts (see Figure 3). Current rates of prescriber sign up in the Initiative counties, including Mohave County, can be found in Table 8. These findings indicate that the concentrated Sign Up to Save Lives campaign implemented at the local level has worked above and beyond the broader attempts made at the state level (e.g., email blasts, trainings and awareness presentations) or different approaches made at the local level in non-Initiative counties.

Figure 3.

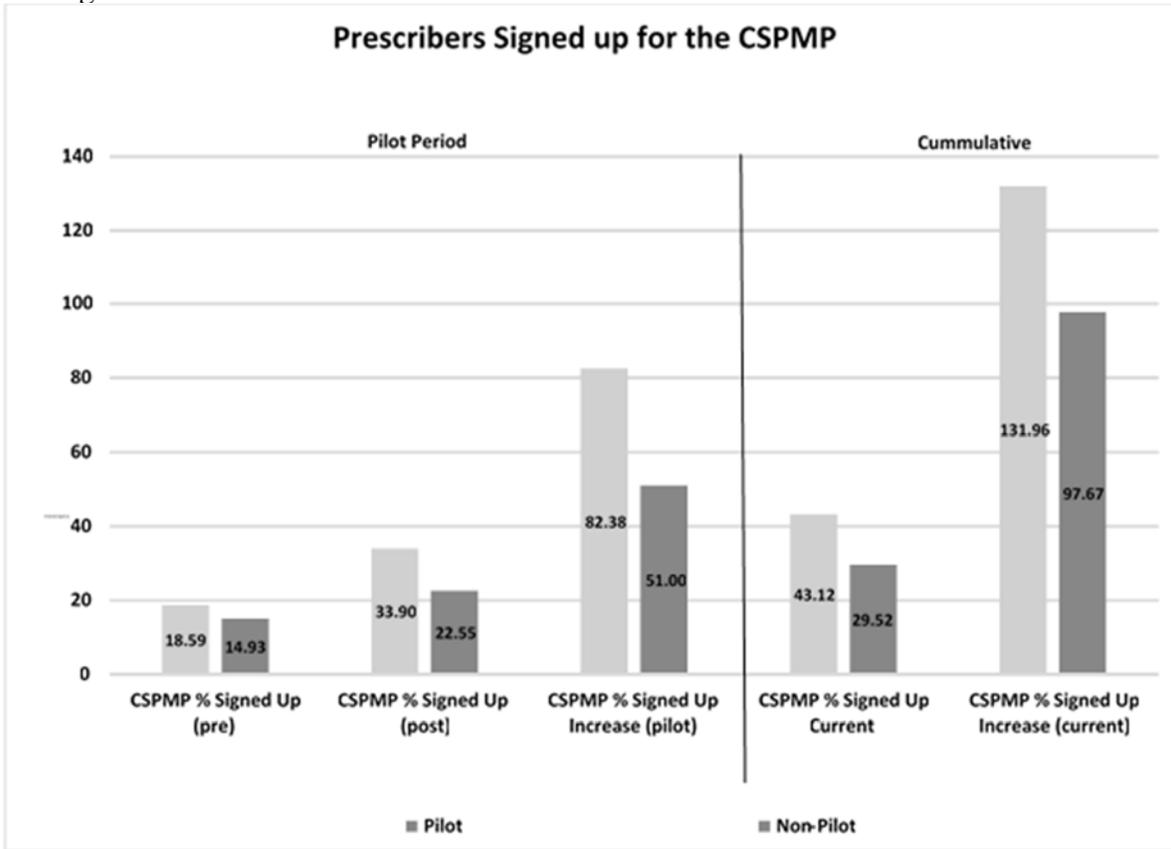


Table 8.

CSPMP Sign Ups as of November, 2014		
County	Prescribers	Pharmacists
Yavapai		
% Increase	107.98	270.59
% Prescribers Signed Up	42.16	N/A
Pinal		
% Increase	212.50	257.69
% Prescribers Signed Up	43.60	N/A
Graham/Greenlee		
% Increase	92.31	72.73
% Prescribers Signed Up	52.63	N/A
Mohave		
% Increase	43.83	42.86
% Prescribers Signed Up	35.79	N/A
Arizona Total		
% Increase	109.28	307.30
% Signed Up	31.34	59.71

In concert with the increases in prescribers and pharmacists signing up to use the CSPMP, Arizona saw an 83 percent increase in the number of queries actively being made to the CSPMP system from 2012 to 2013 (Figure 4). A pre-post examination of the pilot counties revealed an even greater

increase in use of the CSPMP system, with a 116.7 percent increase between the quarter prior to the pilot Initiative compared to the current quarter, and a consistent increase across time (Figure 5). Again, these findings further support the efficacy of the localized Sign Up to Save Lives campaign.

Figure 4.

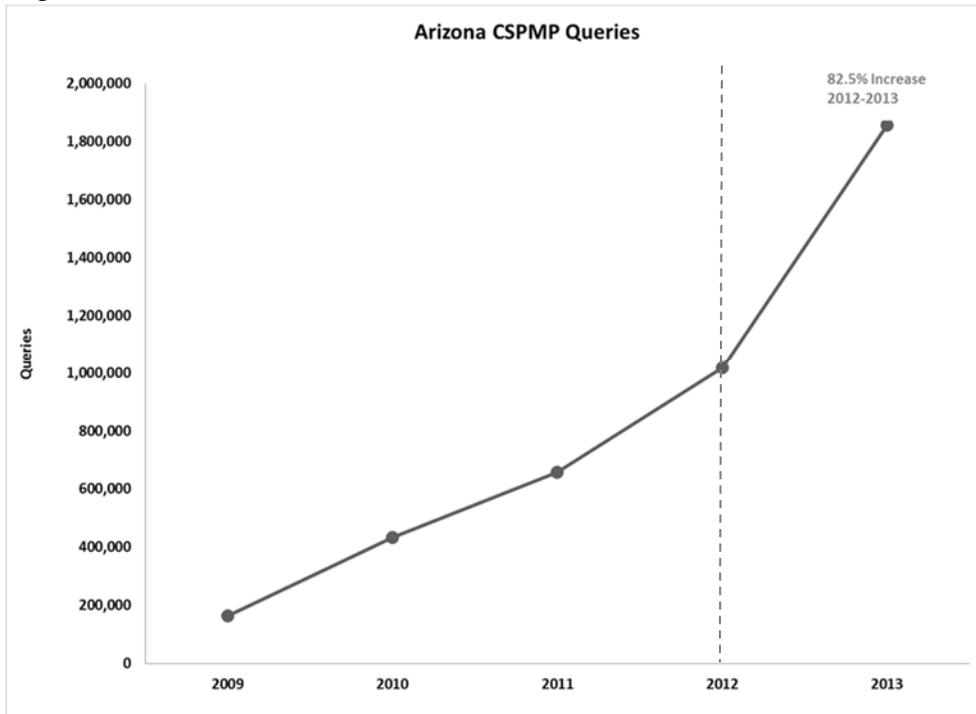
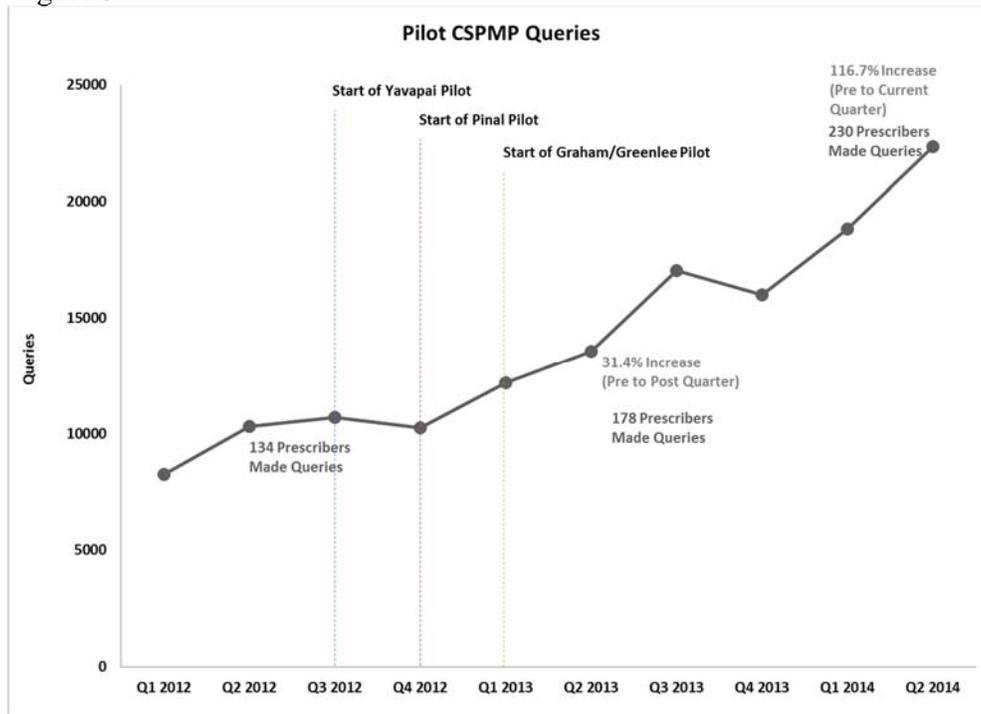


Figure 5.



Provide Education and Training and Increase Awareness of Individual Prescribing Habits

The best measure to evaluate whether the outreach and efforts made with individual prescribers has worked is to examine whether rates of prescriptions and pills dispensed have actually decreased. At the state level, the rates of controlled substance prescriptions and pills for the five drug categories of interest all decreased from 2012 to 2013 (see Figure 6 and Figure 7). Both pilot and non-pilot counties had decreases in all five drug categories; however, Yavapai and Graham/Greenlee Counties had greater decreases in rates of prescriptions and pills for the aggregate rates of controlled substances, and in particular, for oxycodone, benzodiazepines, and carisoprodol (see Figure 8 and Figure 9). Yavapai County also made greater decreases for Hydrocodone prescriptions and pills relative to their non-pilot counterparts and all three pilot counties had greater decreases in rates of pills for Other Pain Relievers. It should be noted that Pinal County started and ended with significantly lower rates than the other two pilot counties and relative to the non-pilot counties, but still made decreases in all rates of prescriptions and pills for the five drug categories, with the exception of a slight increase (1.9 percent) for rates of oxycodone prescriptions (See Table 9 for details). In addition, in Casa Grande - the concentrated area of programmatic focus for Strategy 2 in Pinal County – decreases were seen in all rates of prescriptions and pills across the five drug categories using a pre-post-test comparing the 6 months prior to the Initiative to the six months post Initiative (see Figure 10 and Figure 11). Moreover, decreases for aggregate rates of all controlled prescriptions and pills were greater than non-Initiative counties (10.1 percent and 10.2 percent). Likewise, decreases in rates of prescriptions across all five independent drug categories were greater than non-Initiative counties and rates of pills were lower for hydrocodone, benzodiazepines, carisoprodol, and other pain relievers. Once again, the elevated level of intended decreases in pilot areas relative to non-pilot areas indicates that the work conducted at the local level appears to produce results above and beyond either a different approach at the local level and in addition to the broader statewide efforts.

Figure 6.

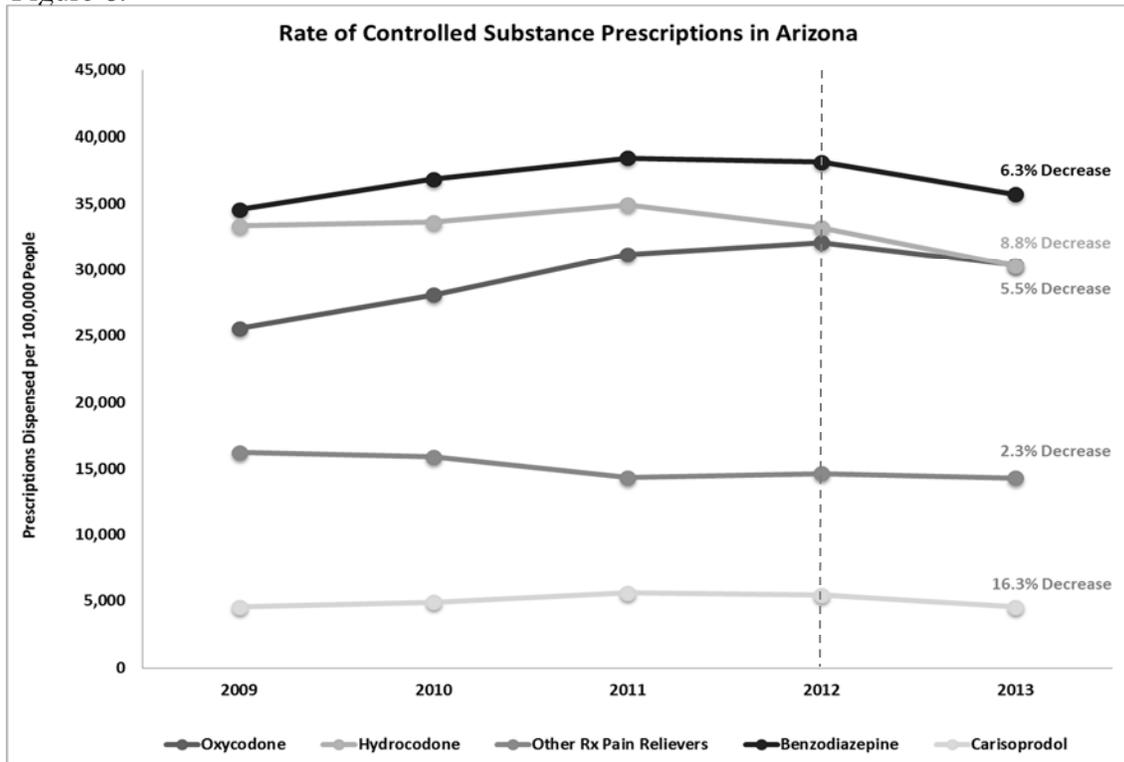


Figure 7.

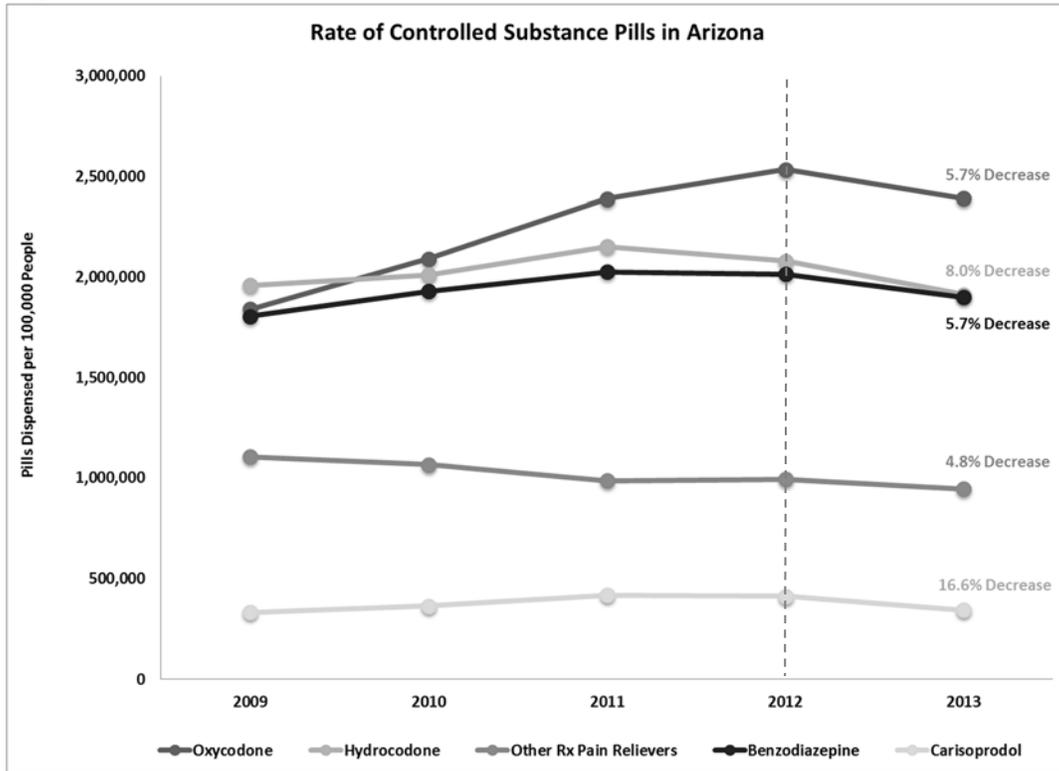


Figure 8.

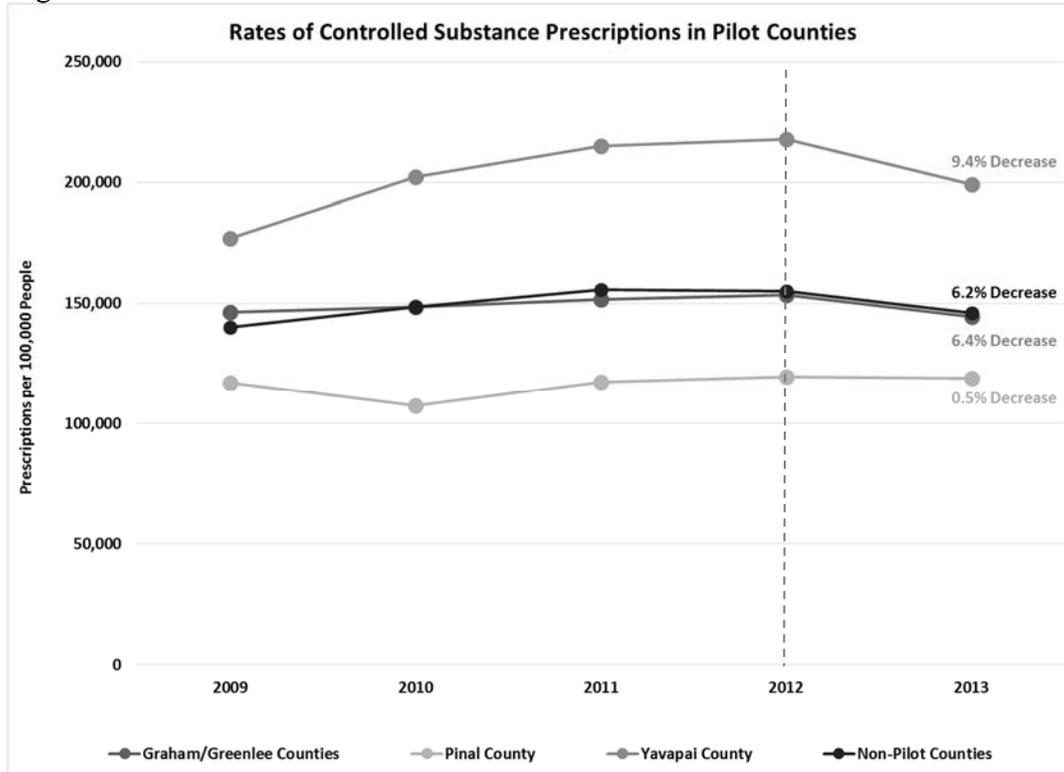


Figure 9.

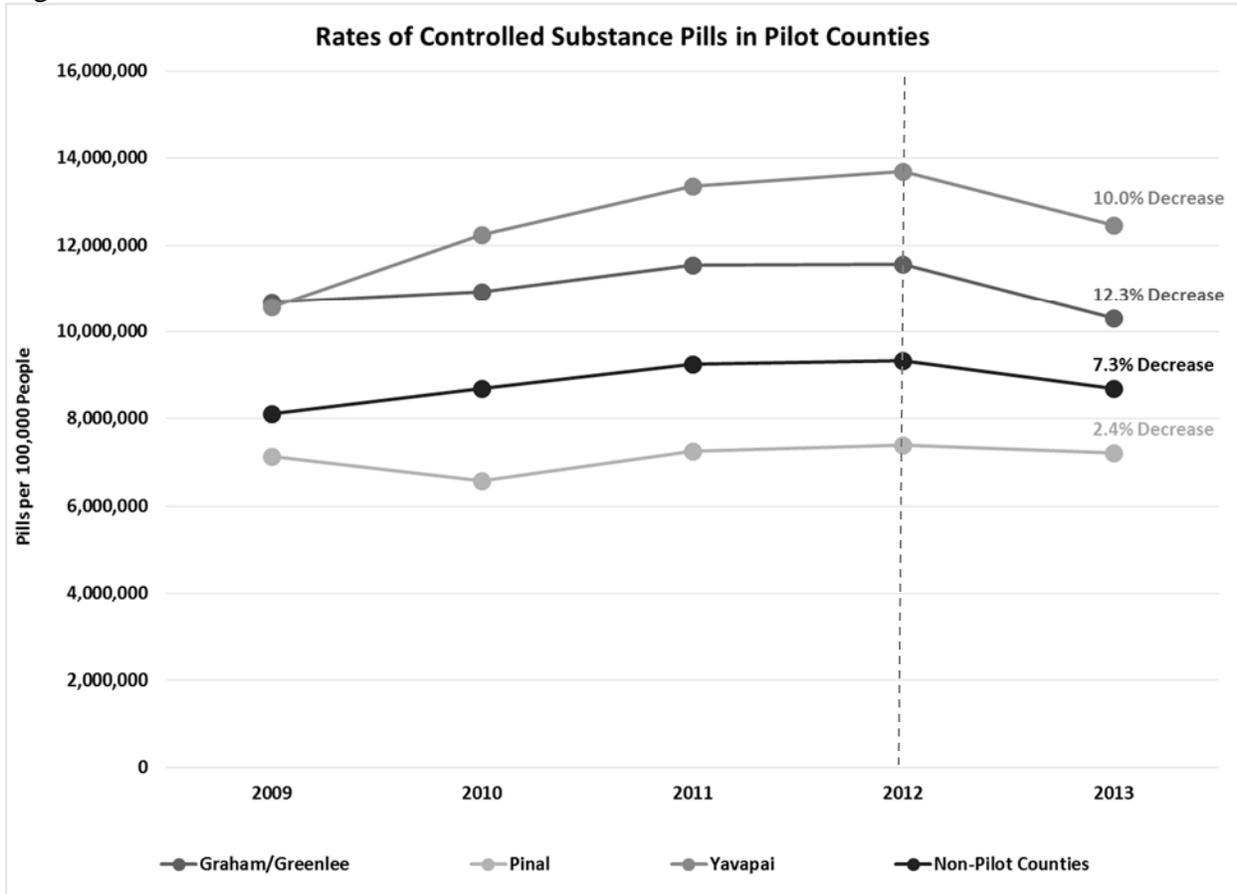


Table
9.

Oxycodone Prescription Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	146,575.91	148,673.81	151,711.87	153,676.66	144,472.69	-6.4%
Pinal County	116,972.89	107,422.89	117,535.28	119,477.02	118,845.75	-0.5%
Yavapai County	177,084.56	202,349.40	215,008.50	218,055.89	199,231.58	-9.4%
Non-Pilot Counties	140,147.13	148,764.53	155,736.58	155,166.37	146,144.44	-6.2%
Oxycodone Pill Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	10,683,989.27	10,925,998.20	11,540,967.67	11,563,635.21	10,299,606.44	-12.3%
Pinal County	7,142,161.86	6,576,480.03	7,254,128.90	7,402,855.11	7,226,979.30	-2.4%
Yavapai County	10,557,797.71	12,249,055.83	13,352,743.47	13,702,267.84	12,452,311.36	-10.0%
Non-Pilot Counties	8,115,650.27	8,693,416.26	9,250,970.93	9,328,774.48	8,696,780.21	-7.3%
Hydrocodone Prescription Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	146,575.91	148,673.81	151,711.87	153,676.66	144,472.69	-6.4%
Pinal County	116,972.89	107,422.89	117,535.28	119,477.02	118,845.75	-0.5%
Yavapai County	177,084.56	202,349.40	215,008.50	218,055.89	199,231.58	-9.4%
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Non-Pilot Counties	8,115,650.27	8,693,416.26	9,250,970.93	9,328,774.48	8,696,780.21	-7.3%
Other Pain Relievers Prescription Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	146,575.91	148,673.81	151,711.87	153,676.66	144,472.69	-6.4%
Pinal County	116,972.89	107,422.89	117,535.28	119,477.02	118,845.75	-0.5%
Yavapai County	177,084.56	202,349.40	215,008.50	218,055.89	199,231.58	-9.4%
Non-Pilot Counties	140,147.13	148,764.53	155,736.58	155,166.37	146,144.44	-6.2%
Other Pain Relievers Pill Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	10,683,989.27	10,925,998.20	11,540,967.67	11,563,635.21	10,299,606.44	-12.3%
Pinal County	7,142,161.86	6,576,480.03	7,254,128.90	7,402,855.11	7,226,979.30	-2.4%
Yavapai County	10,557,797.71	12,249,055.83	13,352,743.47	13,702,267.84	12,452,311.36	-10.0%
Non-Pilot Counties	8,115,650.27	8,693,416.26	9,250,970.93	9,328,774.48	8,696,780.21	-7.3%
Benzodiazepine Prescription Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	146,575.91	148,673.81	151,711.87	153,676.66	144,472.69	-6.4%
Pinal County	116,972.89	107,422.89	117,535.28	119,477.02	118,845.75	-0.5%
Yavapai County	177,084.56	202,349.40	215,008.50	218,055.89	199,231.58	-9.4%
Non-Pilot Counties	140,147.13	148,764.53	155,736.58	155,166.37	146,144.44	-6.2%
Benzodiazepine Pill Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	10,683,989.27	10,925,998.20	11,540,967.67	11,563,635.21	10,299,606.44	-12.3%
Pinal County	7,142,161.86	6,576,480.03	7,254,128.90	7,402,855.11	7,226,979.30	-2.4%
Yavapai County	10,557,797.71	12,249,055.83	13,352,743.47	13,702,267.84	12,452,311.36	-10.0%
Non-Pilot Counties	8,115,650.27	8,693,416.26	9,250,970.93	9,328,774.48	8,696,780.21	-7.3%
Carisoprodol Prescription Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	146,575.91	148,673.81	151,711.87	153,676.66	144,472.69	-6.4%
Pinal County	116,972.89	107,422.89	117,535.28	119,477.02	118,845.75	-0.5%
Yavapai County	177,084.56	202,349.40	215,008.50	218,055.89	199,231.58	-9.4%
Non-Pilot Counties	140,147.13	148,764.53	155,736.58	155,166.37	146,144.44	-6.2%
Carisoprodol Pill Rates per 100,000 Population						
	2009	2010	2011	2012	2013	% Change 2012-2013
Graham/Greenlee Counties	10,683,989.27	10,925,998.20	11,540,967.67	11,563,635.21	10,299,606.44	-12.3%
Pinal County	7,142,161.86	6,576,480.03	7,254,128.90	7,402,855.11	7,226,979.30	-2.4%
Yavapai County	10,557,797.71	12,249,055.83	13,352,743.47	13,702,267.84	12,452,311.36	-10.0%
Non-Pilot Counties	8,115,650.27	8,693,416.26	9,250,970.93	9,328,774.48	8,696,780.21	-7.3%

Figure 10.

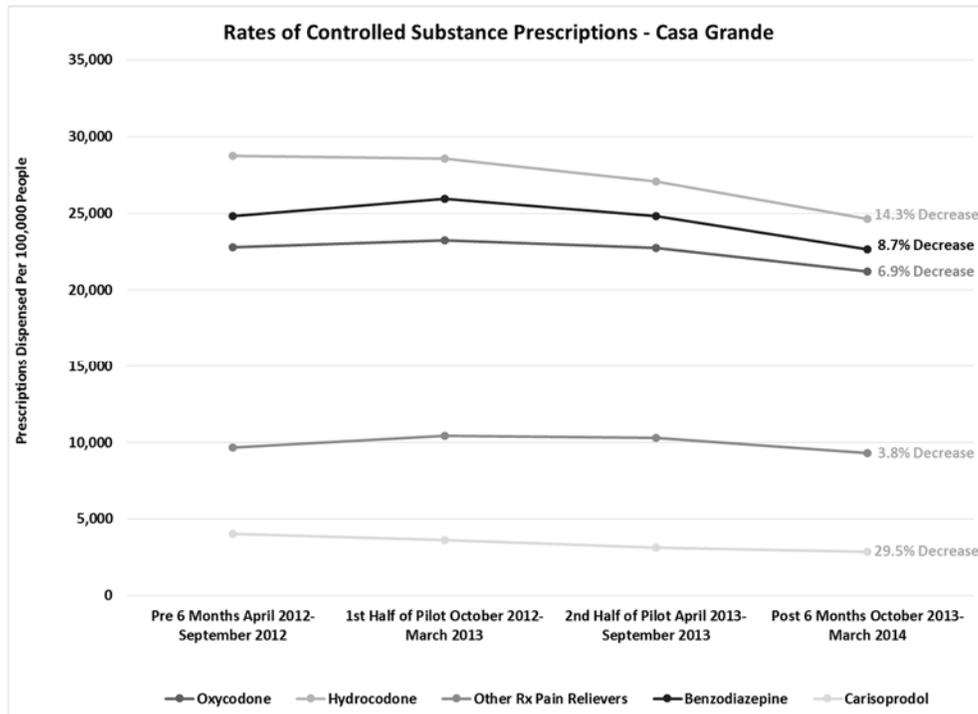
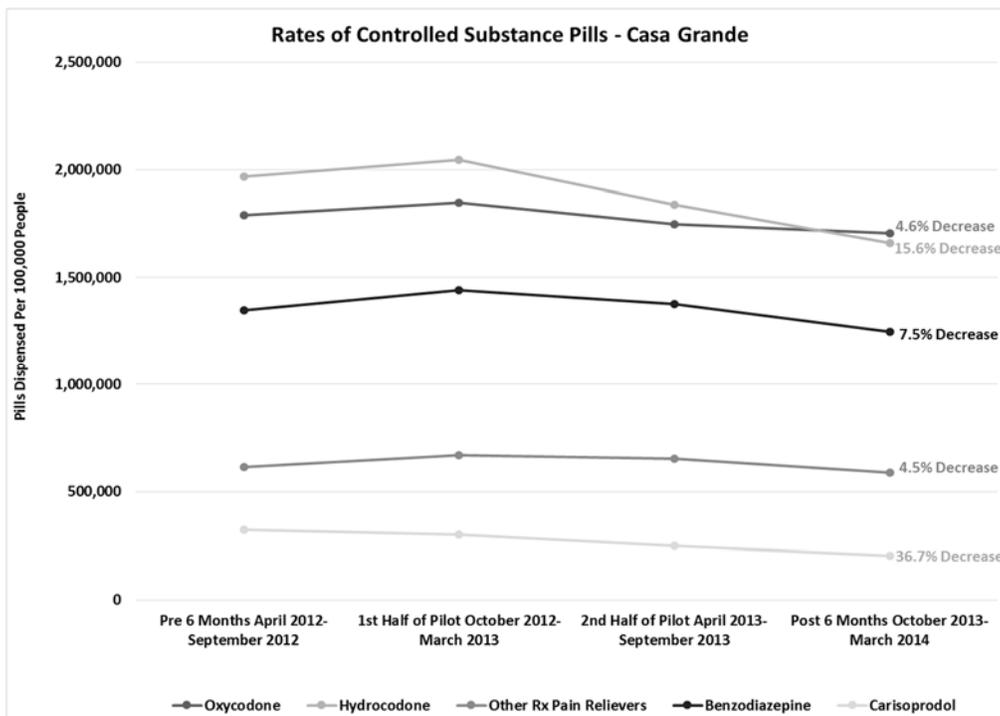


Figure 11.



Although the reduction in rates of prescriptions and pills in such a short period of time is quite promising, substantially lower decreases were seen in the average number of controlled substance pills per prescription in Arizona. From 2012 to 2013, decreases across the five drug categories ranged

from 0.2 percent to 2.6 percent at the state level and 0.2 percent to 5.6 percent in the aggregate pilot counties. At best, these data indicate a promising plateau in the number of pills per prescription, and over time and continued effort, the rates will decline. However, since the number of overall prescriptions and pills are decreasing, it may also be that prescribers are changing their overall volume, but not how many pills they prescribe when they do prescribe. Further analyses are needed to tease out this finding, and additional education efforts may be needed to specifically address this issue, particularly as it relates to potential high dose opioid patients.

An additional area where results were not as expected include the percentage of prescribers flagged as outliers (i.e., one, two, and three standard deviations above the mean) relative to their peers. Initial decreases in outliers falling >1SD and <2SD above the mean were seen in Yavapai and Pinal Counties during the pilot period of the project; however, those results only held cumulatively for Yavapai County. The reverse was true for Graham/Greenlee Counties, who had a slight decrease during the pilot project, but a dramatic cumulative decrease in the following (current) quarter of the analyses. For outliers falling >2SD and <3SD above the mean, decreases occurred in Yavapai County during the pilot portion of the project, but have not held over time, and have increased substantially during the past year of the Initiative. Pinal County saw increases in outliers falling >2SD and <3SD above the mean during the pilot period, but has since trended down. Graham/Greenlee Counties saw significant reduction in outliers falling >2SD and <3SD above the mean during the pilot period and has maintained the decrease into the following (current) quarter). Unfortunately, no decreases were seen in any pilot site for outliers falling >3SD above the mean during either the pilot period or the cumulative period (see Table 10 for detailed description of outlier data). Collectively, these findings suggest that the report cards and local outreach action have worked relatively well over time to reduce outlier prescribing for those prescribers in the lowest range of outliers, but has not worked to change prescribing habits for those outliers in the most problematic range of prescribing. Additional analytical methods and programmatic or monitoring efforts will likely need to be considered in order to address this issue.

Table 10.

Percentage of Prescribers Prescribing Above the Mean for Their Speciality Type			
	>1SD and <2 SD	>2 SD and <3 SD	>3 SD
Yavapai County			
Pre-Test: Q2, 2012	12.20	5.25	3.73
Post Test: Q3, 2013	11.74	4.84	3.97
Current: Q2, 2014	8.47	6.44	4.24
Pre-Post % Change	-3.76	-7.96	6.53
Cumulative % Change	-30.56	22.58	13.64
Pinal County			
Pre-Test: Q3, 2012	11.11	5.11	3.60
Post Test: Q4, 2013	9.31	6.38	4.52
Current: Q2, 2014	13.08	5.23	4.36
Pre-Post % Change	-16.22	25.03	25.47
Cumulative % Change	17.73	2.50	21.00
Graham/Greenlee Counties			
Pre-Test: Q4, 2013	16.05	11.11	3.79
Post Test - Q1, 2014	16.67	5.13	3.96
Current: Q2, 2014	11.11	4.94	4.14
Pre-Post % Change	3.85	-53.85	4.62
Cumulative % Change	-30.77	-55.56	9.28

6.3.3 Strategy 3: Enhance Rx Drug Practice and Polices in Law Enforcement

Provide Education and Training for Law Enforcement Officers

The Arizona High Intensity Drug Trafficking Area Rx Drug Diversion Crimes training has reached 363 law enforcement officers to date. Of those officers, 260 were trained within the pilot counties to improve knowledge, attitudes, awareness, and beliefs of law enforcement officers in prescription drug diversion investigations. Pre-post analyses support the efficacy of the training with significant increases in officers being aware of the problem of prescription drug misuse in Arizona as a whole and in their local jurisdictions and beliefs that law enforcement officers play an important role in combatting prescription drug crimes. A significant increase was also found in attitudes that the training would assist them in doing a better job with diversion investigations (see Table 11).

Table 11.

Pre-Post Efficacy Test of the Rx Crimes Training Course t-test for Equality of Means n=204 pre-test; n=200 post-test				
	μ Pre-Pilot	μ Post-Pilot	p value (2-tailed)	Significant Increase
Prescription drug abuse is a serious problem in Arizona	4.73	4.86	<0.001	Yes
Prescription drug abuse is a serious problem in the jurisdiction where I work	4.56	4.72	0.001	Yes
Law enforcement officers play an important role in prescription drug diversion investigations	4.42	4.81	<0.001	Yes
This training will help me do a better job in drug diversions investigations	4.41	4.70	<0.001	Yes
Note: Items were collected using a 5 point Likert scale; 1=strongly disagree, 2=disagree, 3=undecided, 4=agree, 5=strongly agree				

Most importantly, knowledge of specific information around prescription fraud investigation procedures significantly increased, particularly around when and how the Health Insurance Portability and Accountability Act (HIPAA) applies in their investigations and the appropriate statutes that apply to diversion crimes (see Table 12). The only exception to significant increases in knowledge involved steps that should be taken to involve direct contact with prescribers and obtaining a pharmacist’s statement indicating fraud – the majority of the officers who participated in the training already knew this information prior to the training (91 percent pre-test), creating a ceiling effect for potential knowledge gain. Although knowledge gain was statistically significant for HIPAA and appropriate statutes (ARS §13-3408), it should be noted that post-test results indicated that only 48 percent and 77 percent, respectively, of the officers receiving the training got these answers correct. This indicates that while the training is successful for improving specific knowledge, some improvements can be made to the curriculum to further enhance the efficacy of knowledge gain. The HIDTA training director is aware of these findings and is working with the DEA and other experts to use these data to improve the next iteration of the training.

Table 12.

Pre-Post Efficacy Test of the Rx Crimes Training Course				
Mann Whitney U-test				
n=204 pre-test; n=200 post-test				
	% Correct Pre-Test	% Correct Post-Test	p value	Significant Increase
Which of the following is recommended for successful prosecution of prescription fraud?	91.2	94.0	.30	No
Which of the following correctly describes how HIPPA applies to prescription fraud investigations?	27.9	47.5	.000	Yes
Which is the appropriate statute for charging someone in possession of Oxy without a valid prescription?	70.1	77.0	.002	Yes

Note: Items were collected using a 4 item multiple choice response set

Increase Use of the of the Controlled Substance Prescription Monitoring Program

At the Initiative level, there has been a 140 percent increase in law enforcement officers signed up to use the CSPMP, putting Arizona at a collective 115 percent increase since the inception of the Initiative. At the beginning of the Initiative, there were 182 officers signed up to use the system, and as of November 1, 2012, there were 392, with 104, or 27 percent, accounted for by the Initiative counties. Due to difficulties getting a streamlined process for flagging prescription drug crimes, there is currently no available data to determine how well the use of the CSPMP has assisted in law enforcement's ability to charge and prosecute these crimes. However, each Initiative county has reported arrests and convictions of pill mill rings and local fraudulent prescribers since the inception of the Initiative and post-diversion crimes training, indicating that the use of the CSPMP has provided some assistance in these processes. Moving forward, the evaluation team plans to conduct a content analysis of field reports to better ascertain the extent and details of the prescription drug diversion crimes process in the Initiative counties.

6.3.4 Strategy 4: Increase Public Awareness and Patient Education About Rx Drug Misuse

Adults

As mentioned in the discussion about proper storage and disposal, an attempt was made to evaluate the general public's awareness and knowledge about Rx drug misuse through a community sidewalk survey. Again, these data were dropped from the evaluation model due to poor sampling methods and data from the adult Rx360 curriculums were used as a proxy measure to evaluate intended change in knowledge, attitudes, awareness, and beliefs of Rx drug misuse.

The Rx360 Adult Curriculum that was implemented during the pilot period was specifically designed to increase parent's general awareness of the problem of prescription drug misuse, perception of the risks of misuse and attitudes and knowledge around parent-child communication about risks and resistance strategies. As mentioned previously, the curriculum also provided education around proper storage and disposal methods of prescription drugs. An independent samples t-test of the means indicated a statistically significant improvement in participants' awareness, attitudes, beliefs, and knowledge of all the intended goals of the curriculum (see Table 13). It should be noted that the means

were already relatively high in the pre-test, with most participants already aware of the problem, the risks, and the belief in the importance of talking to their children about Rx drug misuse. This created somewhat of a ceiling effect in how much they were able to learn for most measures, with two important exceptions: (1) feeling knowledgeable enough to talk to their children about the risks of misuse; and (2) feeling knowledgeable enough to talk to their children about specific resistance strategies to use if they are in situations where they are offered pills. There was a 29 percent and 12 percent increase in participants agreeing or strongly agreeing that their knowledge improved across the two areas, respectively, indicating that the curriculum is effective at providing parents with what is likely to have the most impact - the actual skills they need to engage in effective parent-child communication around prescription drug misuse.

Table 13.

Pre-Post Efficacy Test of the Initial Rx360 Adult Curriculum					
t-test for Equality of Means					
n=693 pre-test; n=682 post-test					
	μ Pre-Pilot	μ Post-Pilot	p value (2-tailed)	%Change in Responses Indicating Agree/Strongly Agree	Significant Increase
Prescription drug abuse is a serious problem for youth in the county	4.50	4.78	< 0.001	4.79%	Yes
It is dangerous to misuse prescription drugs	4.78	4.89	< 0.001	0.51%	Yes
Prescription drugs are as dangerous as 'street drugs' like heroin or cocaine	4.39	4.56	0.001	2.35%	Yes
It is important to talk to my kids about the risks of prescription drug abuse	4.75	4.88	< 0.001	0.91%	Yes
I feel like I know enough about prescription drugs to talk to my kids about the risks	3.79	4.39	< 0.001	29.41%	Yes
It is important to teach my kids specific strategies to say "no" to prescription drug abuse	4.71	4.84	< 0.001	0.92%	Yes
I feel like I know enough about prescription drugs to talk to my kids about saying "no"	4.08	4.45	< 0.001	12.22%	Yes

Note: Items were collected using a 5 point Likert scale; 1=strongly disagree, 2=disagree, 3=undecided, 4=agree, 5=strongly agree

Youth

The Rx360 Youth Curriculum was specifically designed to increase participant’s perception of risk (i.e., physical harm and external consequences), decrease the perception that misusing prescription drugs is socially acceptable, and to increase the use of resistance strategies when youth are in

situations where they are offered pills. Given the limited evaluation resources of the Initiative, evaluation of the effectiveness of the curriculum was assessed at the population level using the *Arizona Youth Survey*. Although this method does not allow for an examination of an immediate change in youths’ knowledge, attitudes, awareness, and beliefs, it does provide a more reliable estimate of how well the curriculum’s intended purpose holds over time in the entire population of youth. It also eliminated the burden of extra data collection by those implementing the curriculums in the classroom and preserved the 45 minute class period for the full implementation of the entire curriculum, versus the need to use an abbreviated or less-effective version to allow ample time for pre-post data collection.

Each pilot site saw a reduction in the number of youth who reported perceiving that use of prescription drugs is socially acceptable (eight percent, six percent and 10 percent in Yavapai, Pinal and Graham/Greenlee, respectively). Yavapai and Graham/Greenlee Counties also saw an increase in the percentage of youth reporting that they did not use prescription drugs in the past 30 days due to perceived risk of physical harm, external consequences (e.g., could get arrested, expelled, lose privileges, etc.) and parent disapproval (see Figures 12 and 13). Surprisingly, the youth perceived risk findings did not hold within the Pinal County aggregate analysis (Figure 14). At this time, data are available on resistance strategies, but have not yet been analyzed due to time constraints for an appropriate collaboration with the content experts and authors of the Keepin’ It REAL curriculum. This collaboration will be essential to determine the appropriate method of analysis for these measures and will be included in future iterations of this document as they are made completed.

Figure 12.

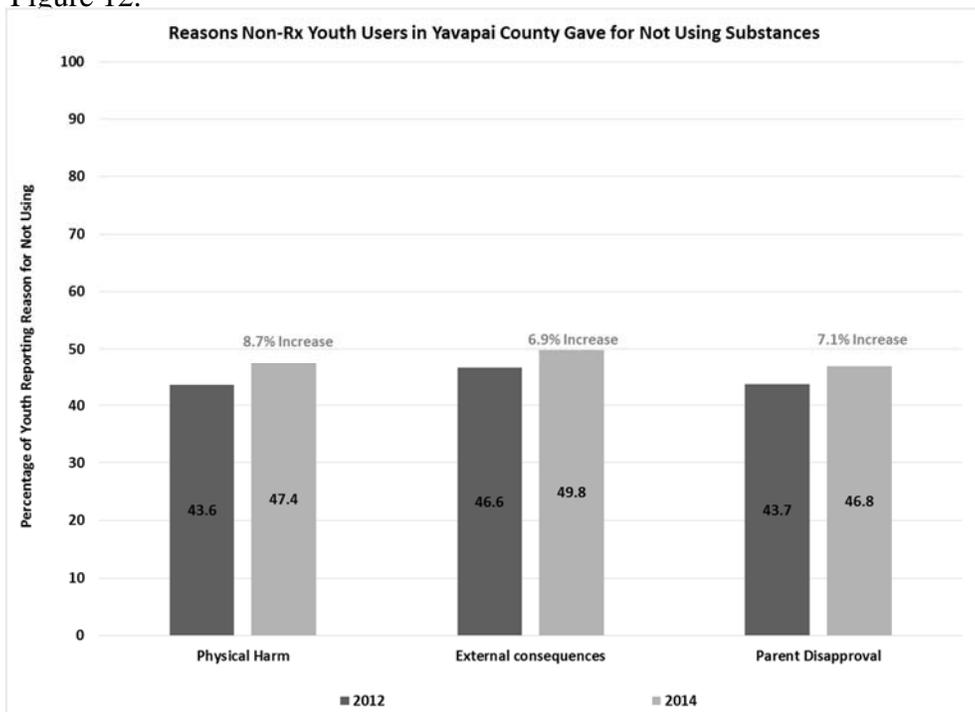


Figure 13.

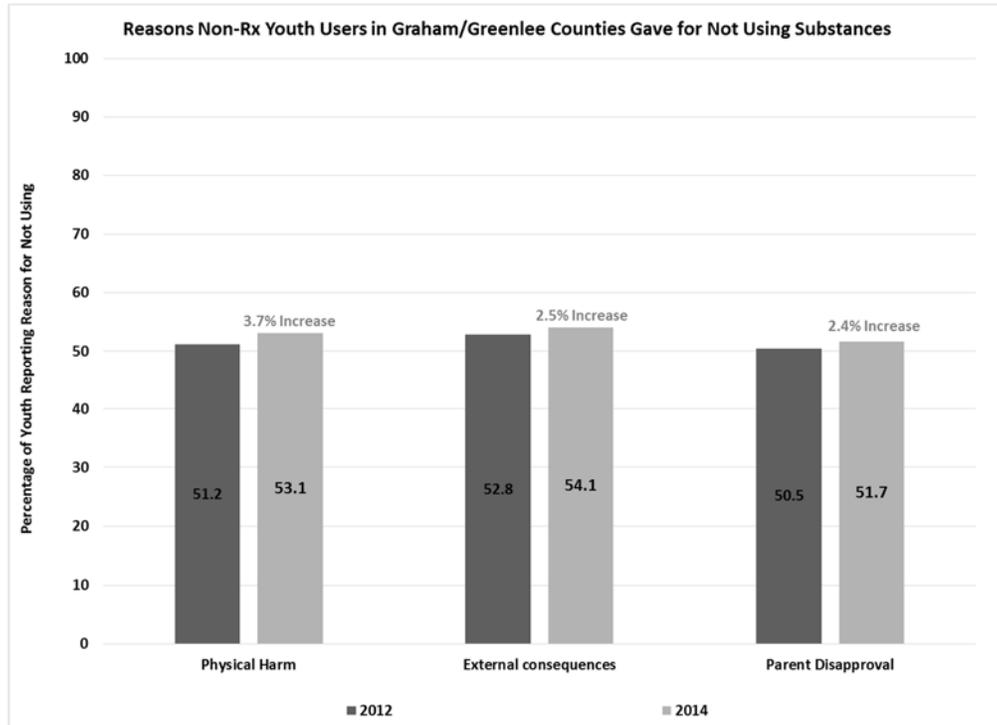
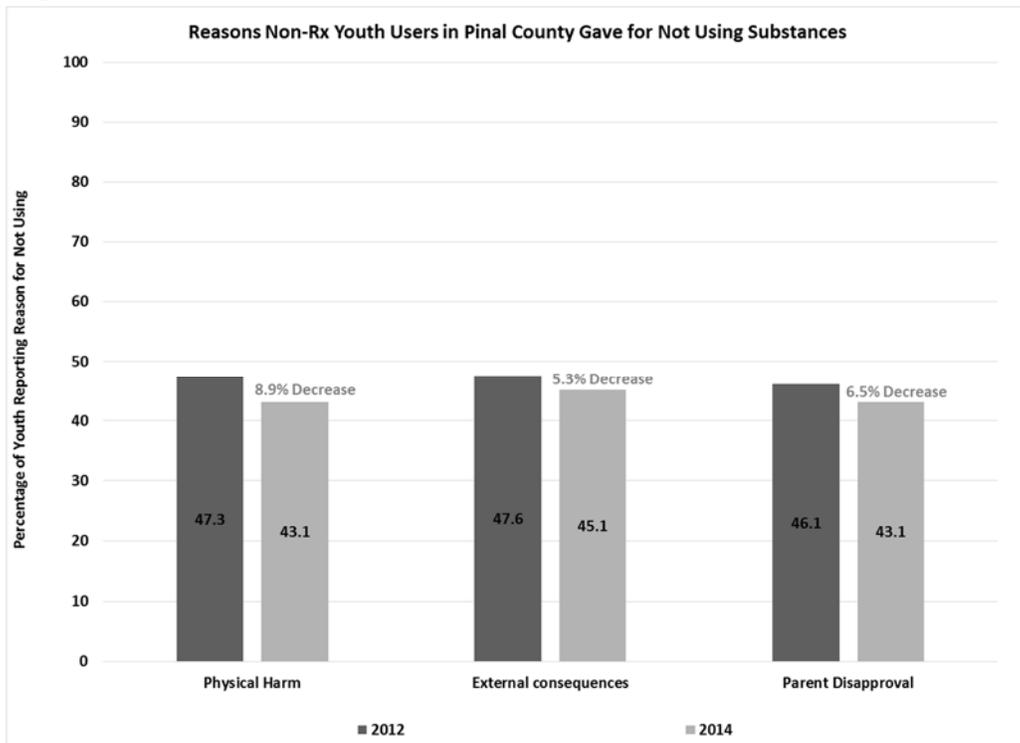


Figure 14.

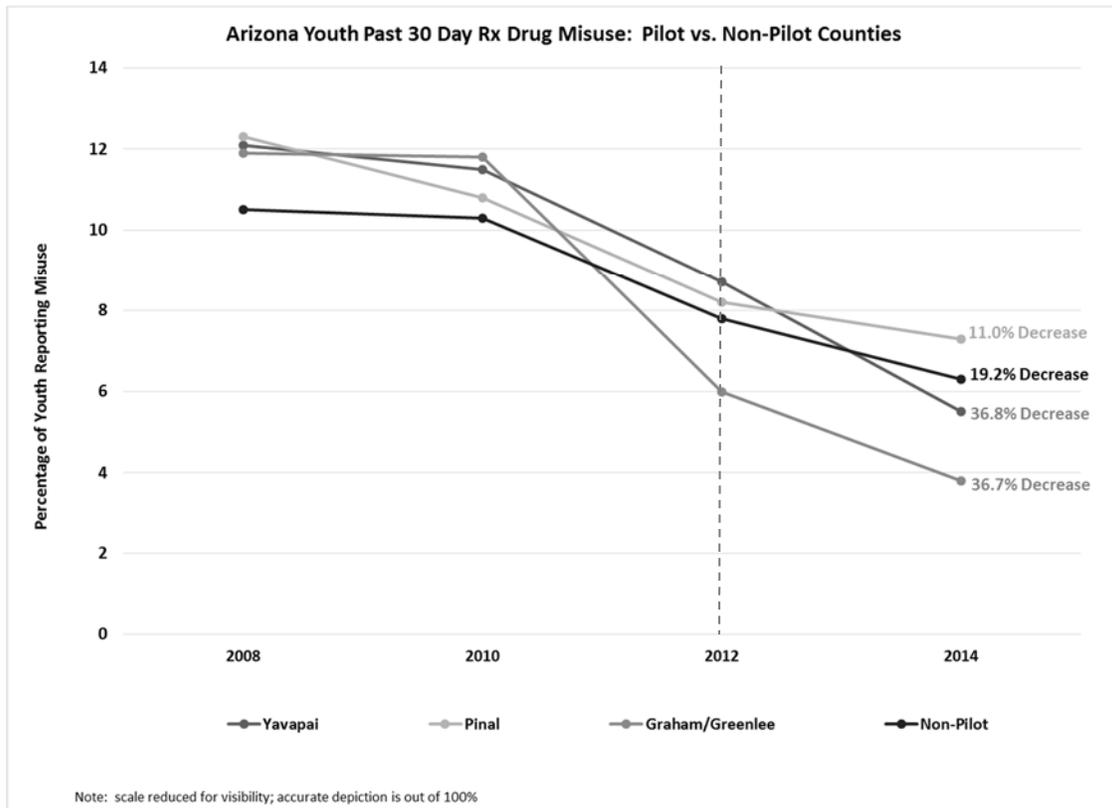


6.4 OUTCOME EVALUATION

6.4.1 Rates of Misuse

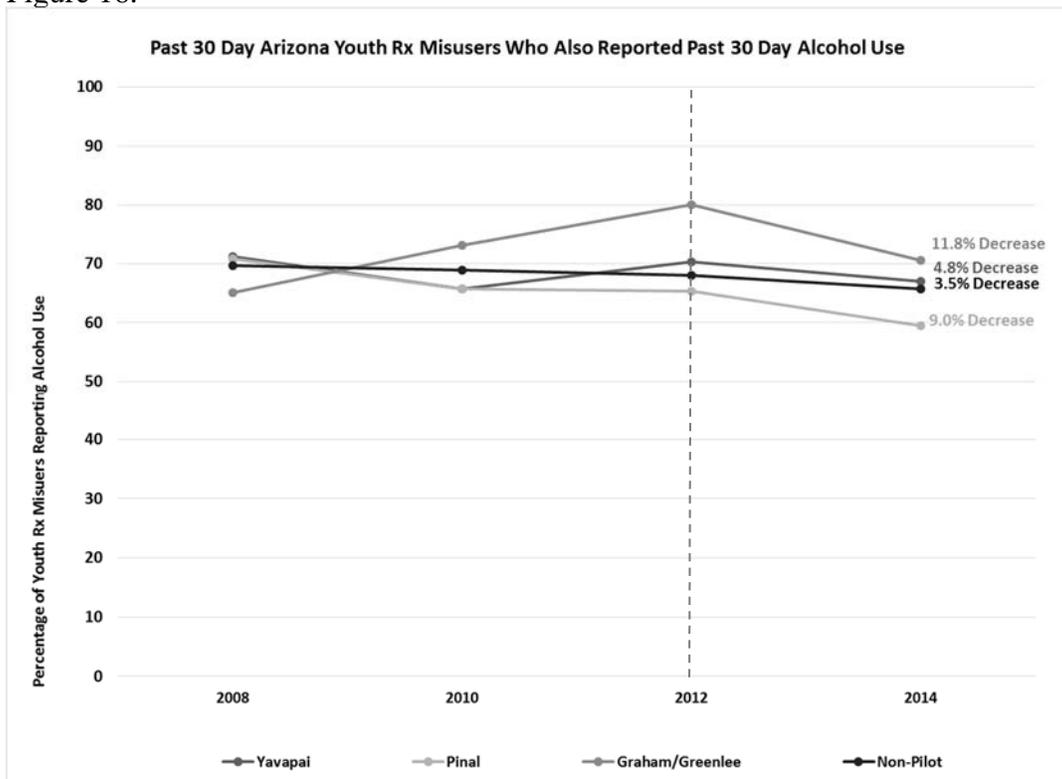
The initial outcome goal of the Arizona Rx Drug Misuse and Abuse Initiative was to reduce rates of misuse and abuse. Adult measures of prescription drug misuse and abuse were unavailable at the time of this report, but should be forthcoming once the results of the current administration of the Arizona Behavioral Risk Factor Surveillance System (BRFSS) is released by the Arizona Department of Health Services. Youth rates of misuse from the biennial *Arizona Youth Survey* indicates that past 30-day prescription drug misuse among Arizona's 8th, 10th and 12th grade students declined 20 percent from 2012 to 2014, resulting in 6.3 percent of Arizona youth currently misusing prescription drugs. Although pilot and non-pilot areas of Arizona saw reductions in the rates of youth prescription drug misuse, the amount of reduction was significantly higher in Yavapai and Graham/Greenlee Counties (37 percent reduction in each site), and both counties' rates now fall below the rate of misuse at the state level (see Figure 15). In fact, at only 1.9 percent of youth misusing, Graham County currently has the lowest rate of youth prescription drug misuse in the state of Arizona. Pinal County as a whole also saw a reduction in youth prescription drug misuse (11 percent), although, it still rests above the state rate for past 30-day youth prescription drug misuse. The majority of the reduction seen in Pinal County was generated by the town of Coolidge and the Coolidge Youth Coalition – a youth-focused coalition that despite not holistically implementing the entire set of Initiative strategies, did spend considerable time educating youth on the risks of misusing prescription drugs. The Coolidge area saw a 41 percent decline in youth prescription drug misuse and currently has a rate of 5.1 percent of past 30-day prescription drug misuse among youth.

Figure 15.



Given the severity of consequences for opioid-naïve individuals combining prescription opioids with alcohol, a particular set of messaging was targeted towards educating youth about the risks of combining the two substances. Based on data from the *Arizona Youth Survey*, the efforts appear to be paying off with decreases seen in pilot and non-pilot areas, and the highest level of decreases seen in the pilot areas (see Figure 16). The analyses for this type of measure were somewhat constrained in the current evaluation, as the *Arizona Youth Survey* could only be tabulated to assess those youth reporting both 30-day alcohol and prescription drug misuse vs. the number of events where youth reported combining both substances in the same event. As such, the illustrations and data described here provide only a limited proxy view of youth cocktailing the two substances. Future iterations of the *Arizona Youth Survey*, beginning in 2014, will include the more precise measure of youth combining alcohol and prescription drugs in the same event.

Figure 16.



6.4.2 Emergency Department Discharges and Inpatient Hospitalizations

From 2012 to 2013 (2014 data is currently unavailable), Arizona saw a 10 percent decrease in non-fatal poisoning-related inpatient hospitalizations. While both pilot and non-pilot areas decreased, the percent decrease was substantially higher in pilot areas (18 percent vs. 8 percent), and rates are now significantly lower in the pilot counties (See Figure 17). Emergency Department discharge data saw unexpected and unanticipated increases for opioid-related abuse and dependency in pilot and non-pilot areas in Arizona, with pilot areas seeing significantly greater increases (see Figure 18). These data could indicate a number of things, among them: (1) the Initiative was successful at decreasing near-overdoses, but not the number of individuals abusing or chemically dependent upon prescription opioids, that without a strong treatment component of the Initiative, abusers will continue to cycle in and out of the emergency department; (2) changes in primary care physicians prescribing habits have resulted in more “break-through” pain episodes and the need to seek care in the emergency department; and/or (3) the new emergency department guidelines and training have resulted in hyper

vigilance on the part of the staff to recognize prescription opioid abuse and dependency and they are more actively inputting this in the ICD codes. Although the exact reason cannot currently be determined, the findings certainly warrant further examination to determine root cause and corresponding next steps.

Figure 17.

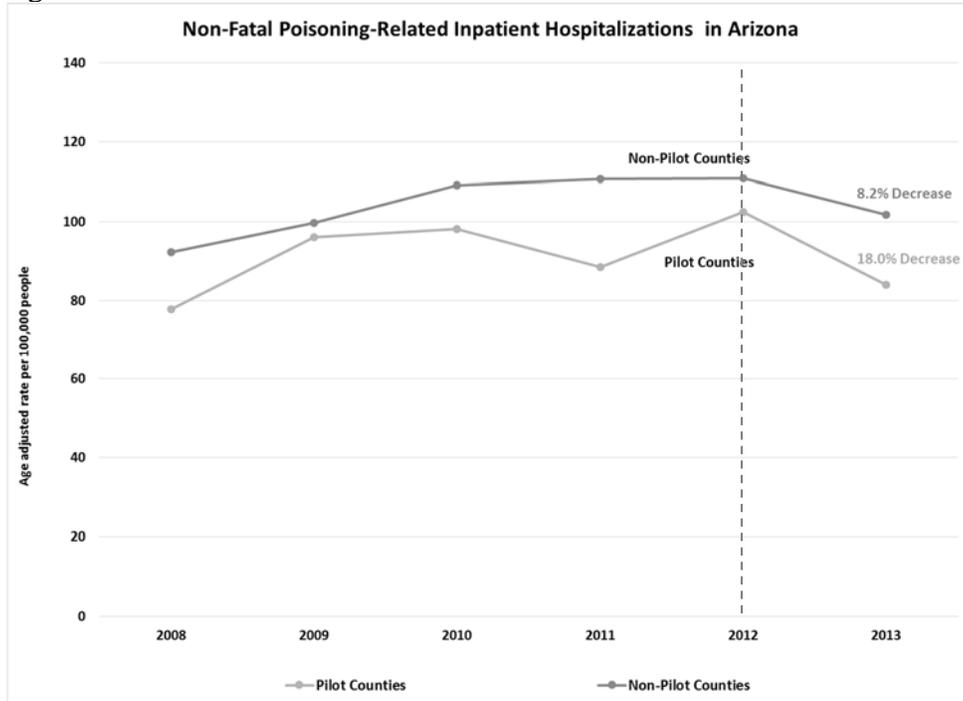
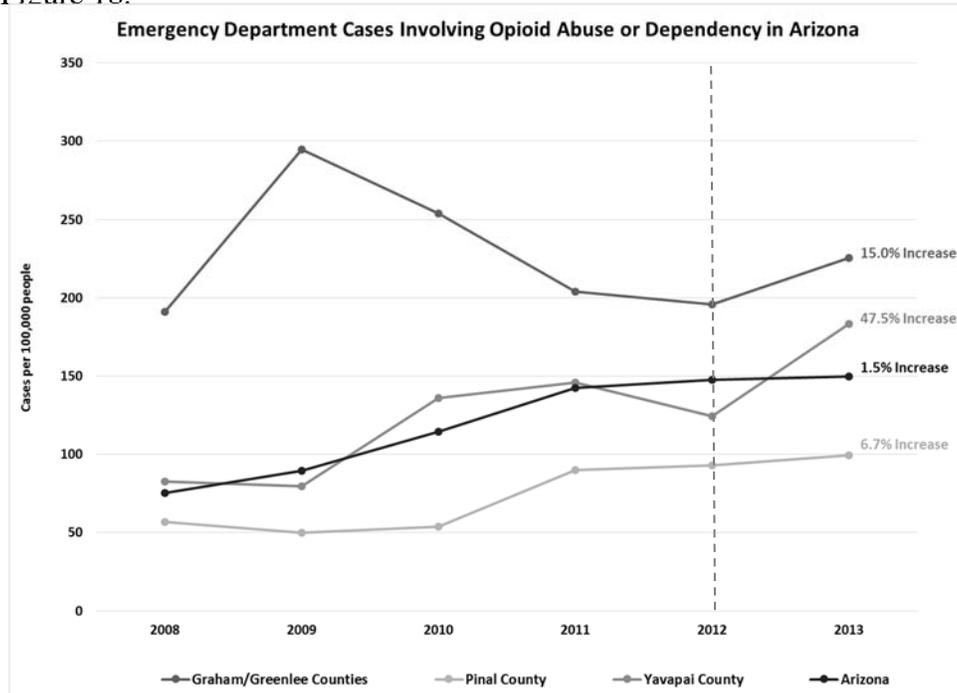


Figure 18.



6.4.3 Drug-Related Overdose Deaths

Given that deaths from prescription opioids was the catalyst for the Centers for Disease Control and Prevention declaring a national epidemic in 2010, reducing the rate of opioid-related deaths was vital for determining the success of the Arizona Rx Drug Misuse and Abuse Initiative. While Arizona saw increases in all drug-related deaths and a plateau of opioid-specific related deaths from 2012 to 2013 (2014 data currently unavailable for analyses; see Figure 19), pilot counties saw dramatic decreases. Pilot counties saw a 6 percent decrease in all drug-related deaths, while their non-pilot counterparts saw a 15 percent increase, and pilot counties now have lower drug-related death rates than non-pilot counties (Figure 20). Most importantly, pilot counties saw a 28 percent reduction in rates of opioid-related deaths, while non-pilot counties saw a 4 percent increase, and again, pilot counties now have lower rates of opioid-related deaths than their non-pilot counties (Figure 21). Collectively, these data clearly illustrated that the implementation of the Arizona Rx Drug Misuse and Abuse Initiative is a successful model for saving lives.

Figure 19.

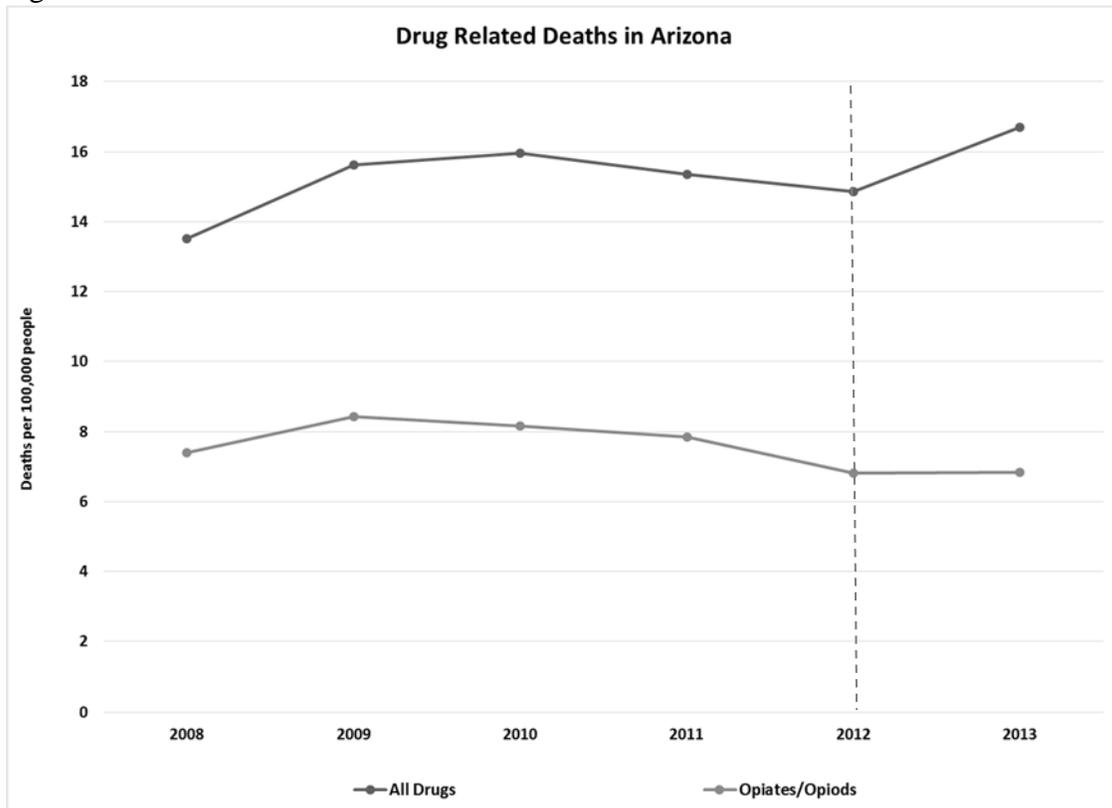


Figure 20.

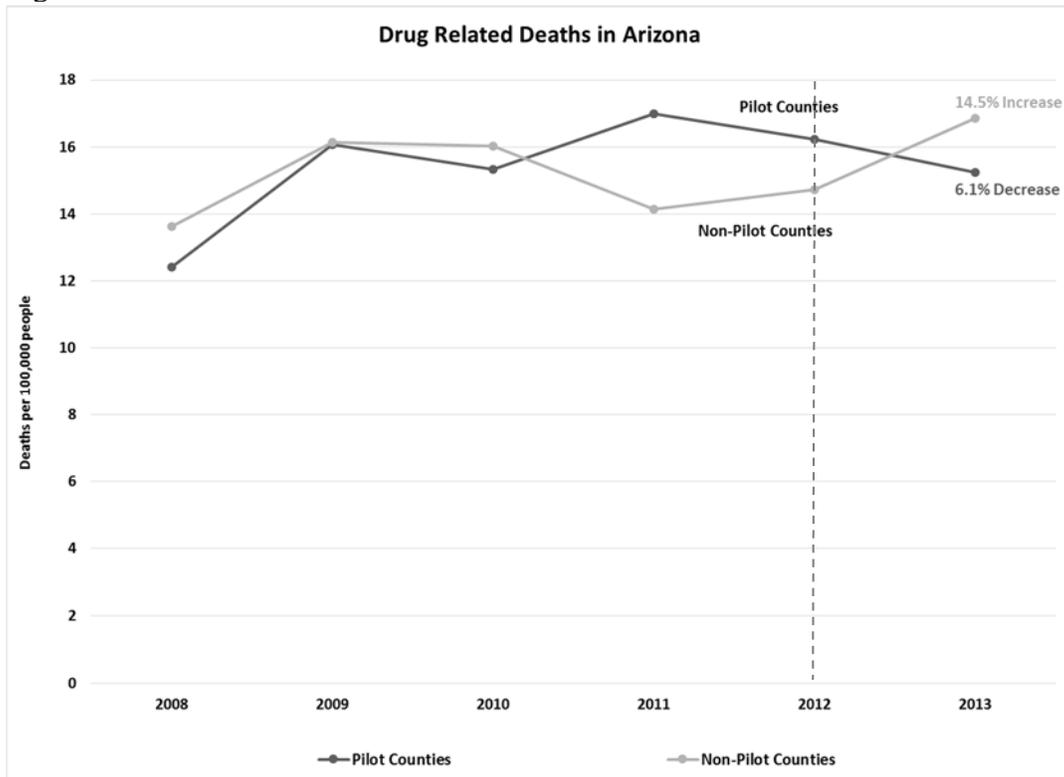
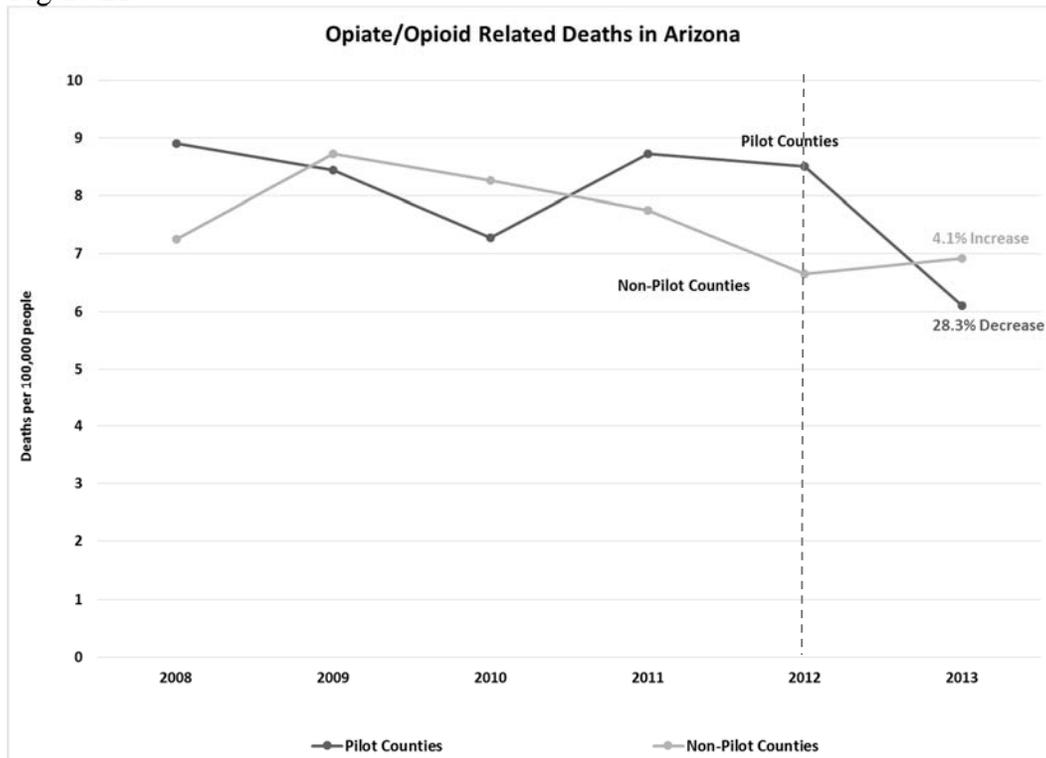


Figure 21.



7 LESSONS LEARNED AND NEXT STEPS

Several lessons learned throughout the pilot project were identified and used to make improvements to the model. These lessons were gleaned from the evaluation data (quantitative and qualitative), as well as the ongoing dialogue with the community and coalition leaders.

7.1 STRATEGY 1

For strategy one, it became clear that simply telling people to properly store medication in the home was insufficient. Community members need concrete examples, and providing several options ranging in cost and functional use is ideal. For proper disposal, two sites found that take-back events become less necessary as more drop boxes were put in place. However, one county still generated large collection amounts at take-back events, even with consistent increases in drop box use. Ongoing assessments and cost-benefit decisions should be made about the necessity of take-back events based on the amount collected.

7.2 STRATEGY 2

For strategy two, several obstacles related to use of the CSPMP were identified. The two most frequently stated impediments to use by clinicians included the time it takes away from an already overloaded schedule to use it and the relative accuracy of the data given the seven day lag in updates to the system. Recognizing the need to minimize the time and accuracy issue, the MATFORCE coalition worked with State Senator Kelly Ward from Mohave County to pass legislation (i.e., SB1124) that would allow office designees to pull patient medication history reports from the CSPMP on behalf of their prescribers. This piece of legislation also addressed the timeliness issue by requiring pharmacists to update dispensed medication records to the system within 24 hours. The legislation became effective in July of 2014 and the Arizona Board of Pharmacy began accommodating designee use of the system in September of 2014. Efforts need to be made at the state and local community level to market the new designee option, as well as continued efforts to market the CSPMP for its intended purpose – a tool to enhance patient safety and minimize the ever-growing potential for malpractice liability.

Other needed improvements to the CSPMP include clear demarcations to flag patients at elevated risk for overdose and dangerous drug combinations. Recognizing this need, the Arizona Board of Pharmacy began including Morphine Milligram Equivalent Dose information into report queries as a way to allow prescribers and pharmacists to easily determine if a re-evaluation of patient medication is needed. Next steps will involve providing brief education and training on the suggested thresholds and use of MEDDs in clinical practice.

Although the prescriber report cards have been an effective way for raising general awareness and encouraging self-monitoring, creating fair comparison groups in smaller communities has been challenging. To address this issue, the intent of the state is to move away from county-level comparisons and towards a larger statewide provider type comparison. Because there is no systematic way to statistically account for patient volume or patient type in the algorithm to define outliers, further improvements to the report cards will include the addition of the number of patients exceeding the 100 MEDD threshold suggested by the CDC as a re-evaluation point, as well as dangerous drug combinations. This will provide an additional layer of information to raise prescriber awareness, promote self-monitoring and correction of prescribing habits, and enhance patient safety. Again,

education and training on MEDDs and dangerous drug combination will be needed, and endorsement by regulatory boards and associations to include these two components in best practice standards will be a necessary next step.

The need for effective prescriber and patient education continue to be of great need in our state. As mentioned in the previous strategy section, the Arizona Department of Health Services recently created the *Arizona Opioid Prescribing Guidelines* to help clinicians ensure patient safety by prescribing opioid medication in the smallest dose and for the shortest time possible. The guidelines are currently available to all community-based prescribers. The Arizona Department of Health Services has also partnered with the University of Arizona to develop a prescriber-based training and core group members from Prevention Works, LLC and the MATFORCE coalition have partnered to develop some basic pain management pamphlets and short videos for prescribers to use with their patients. The patient materials cover expectations of pain management, non-medication alternatives, use of multiple therapies, potential risks and side effects of opioid treatment, and messaging about proper storage and disposal of medication. Wide-scale dissemination of the guidelines and patient materials into health care offices and clinics is an intended next step, and statewide efforts will be made to make the prescriber education from the University of Arizona available once the modules are completed. The Arizona Board of Osteopathic Examiners also intends to provide one additional event for the opioid prescribing CME training developed by the University of Nebraska in January of 2015.

The issues around patient satisfaction and reimbursement difficulties continues to present a problem for some hospitals and emergency departments in Arizona. Some hospitals continue to be legitimately intimidated by the threat of low satisfaction scores by patients who are unhappy that they are not receiving the type or quantity of medication they desire. Interestingly, the two Yavapai County hospitals involved in the pilot project reported that any financial hit they initially took was minimal and of short duration, and more importantly, the guidelines contributed to a better and safer working environment for their staff and patients' long-term outcomes and immediate safety. While the issue of reimbursement being tied to patient satisfaction is largely decided by the federal Medicare and Medicaid system and beyond the scope of the Arizona Rx Drug Initiative, some steps have been taken by the Arizona Department of Health Services' licensing division to address the patient satisfaction dilemma by requiring that all healthcare facilities have a stated policy for prescribing controlled substances and offering the *Emergency Department Guidelines* as an example policy.

7.3 STRATEGY 3

The Arizona HIDTA has been briefed on the areas needing enhancements in the current Rx Drug Diversion Crimes training and intends to strengthen the training to ensure continued future efficacy in law enforcement's knowledge gain of diversion crimes. An additional drug recognition training is also currently being offered by the Governor's Office of Highway Safety and the two trainings will continue to be marketed to law enforcement across the state. Given the significant increase in rates of Driving Under the Influence of Drugs, the Governor's Office of Highway Safety has also agreed to partner with the core group to develop statewide public safety announcements cautioning Arizona driver's about the risks of driving while using controlled substance prescriptions. This office has had incredible success with their "Drive Hammered, Get Nailed!" campaign, and adding this component to the Initiative is expected to have a significant effect on the public's attitudes and knowledge surrounding this issue.

Law enforcement have expressed considerable frustration with gaining timely access to data that identifies fraudulent prescribing and diversion crimes. Because Arizona law limits law enforcement's CSPMP access to open investigations only, the Initiative faced a considerable conundrum when ACJC researchers and the Arizona Board of Pharmacy analysts began to find extreme cases of prescribing patterns in the data. The crux of the Initiative has been based on providing prescribers the awareness, education, and ability to self-monitor and self-correct; however, given how many lives are lost each year, that prescribers in the Initiative counties have had one to three years to make these changes, and that few changes have been made in prescribing patterns of extreme outliers, the inability to alert law enforcement of known prescribers with clear fraudulent behaviors presents an ethical dilemma. Unfortunately, this issue continues to remain unsolved in Arizona.

With respect to the goal of creating a system to flag prescription drug-related crime data, two law enforcement agencies in the pilot sites successfully implemented the change in how they were collecting incident-level information. One agency accomplished this by modifying their record management system to allow for a prescription drug "flag" and the other by manually marking incident reports that had a prescription drug nexus. Many law enforcement agencies rely on proprietary software to manage their data. To make changes to the functionality of the software typically requires agencies to pay for software developers to make that change on behalf of the agency. As a result, in times of fiscal austerity most law enforcement agencies do not have the resources needed to modify the software to meet emerging data collection needs. The consequences of not having this information include, local law enforcement agencies that do not have the capacity to fully understand the impact of prescription drug misuse and abuse on crime in their jurisdictions and the inability to evaluate the success of their efforts to address the problem. The ability to collect, analyze, and understand data on existing and emerging public safety issues is critical to a data-driven approach that maximizes the effectiveness and efficiency of our public safety agencies. Moving forward, public safety agencies in Arizona and elsewhere should not only plan for their existing record management infrastructure needs, but also build in the flexibility that allows agencies to respond to emerging public safety issues and take full advantage of the information they collect and the analytical promise administrative record data.

7.4 STRATEGY 4

A few months into the Initiative, the coalitions identified the need for an additional Rx360 module that was shorter, applied to a broader audience, and that would resonate with adults who did not have school-age children living in the home. Based on this feedback, the state trainer from Prevention Works, LLC worked with the coalition leads and the state project coordinator to develop the Rx360 Community module. This module is now readily available in the Arizona Rx360 suite and included as part of the Speaker's Bureau training.

Although the communities had remarkable success implementing the youth modules of the Rx360 curriculums, each site had some struggles finding adult groups to present the material. Attempts to address this impediment included the state trainer offering the material via webinar and providing specific suggestions for potential venues, but the reach of the parent and adult audience was limited in scope relative to the youth, prescriber, and pharmacist reach. Not surprisingly, the limited reach did not produce the level of increase the Initiative partners had hoped for in the increasing the number of parents actively talking to their children about the risks of prescription drug misuse. Moving forward, additional solutions will involve partnering with county public health departments to infuse the curriculum into existing work-site Initiatives and home-visiting programs.

Local, state, and national data continue to identify particular populations either at elevated risk for misuse, abuse, and correlated negative consequences or with specialized circumstances that warrant specific attention. These populations include youth and young adults, older adults, Native Americans, veterans and military families, Medicaid patients, and patients receiving combinations of opioids, benzodiazepines, and/or muscle relaxers. Next steps for awareness and risk messaging will continue to include general public materials, with an added focus on these identified special populations. In addition, messaging about over-the-counter medication abuse will also be added to youth messaging.

A particular public health consequence of rising concern involves the rate of infants born with Neonatal Abstinence Syndrome (NAS). According to the National Institute of Health, NAS is defined as a group of problems that occur in a newborn exposed to addictive illegal or prescription drugs while in the mother's womb. From 2008 to 2013, the rate of NAS in Arizona increased 156 percent to an alarming 4.0 per 1,000 births. Although the number of infants diagnosed with NAS relative to all births in Arizona seems low (i.e., ~0.2 percent of all births), the cost ratio is substantially high, with an average stay of 13 days and hospital cost of \$31,070 compared to the average two-day, \$2,500 cost of non-NAS newborns. More importantly, the short and long-term developmental impact on the child remains uncertain, as do the long-term societal costs surrounding this issue. Recognizing the severity of this issue, the Arizona Statewide Task Force on Preventing Prenatal Exposure to Alcohol and Other Drugs is currently in a strategic planning phase for helping devise action items to address this problem in Arizona. The Arizona Rx Drug Initiative coalitions have also shown a vested interest in doing community outreach in this area and have developed an informational pamphlet to begin raising awareness on NAS in their communities.

The average age youth in Arizona begin misusing prescription drugs is 13 years old. While age of onset did increase slightly in Arizona from 2012 to 2014, improvements can and should be made to the model to specifically attempt to delay early onset of misuse. Beginning our efforts in middle school instead of high school was a good start. However, given the association of early onset of substance use and negative youth outcomes, a critical next step for the Initiative will need to involve identifying action items geared towards earlier prevention strategies. For developmental reasons as well as practical reasons, these efforts should largely focus on promoting the social and emotional building blocks that science has illustrated as fundamental to holistic child health, rather than prescription drug specific content. This approach would not only serve to prevent youth prescription drug misuse, but other youth substance use and a range of known risky behaviors.

To address this issue, the pilot coalitions have each expanded their existing prevention methods to include additional efforts that address broader, non-silo approaches for addressing contextual factors affecting all youth substance use and risky behavior in their communities. These efforts include earlier prevention to promote healthy decision-making and accountability in Yavapai and Graham Counties, social norming and parent empowerment in Pinal County, and increasing effective parent-child communication in Graham County. Additional efforts are also being made in Yavapai schools to build and strengthen appropriate coping mechanisms in youth and a community primer is being used throughout the county to redefine the way adults perceive at-risk youth. Discussion of these methods are now included in the cross-coalition collaborative meeting so that all involved coalitions can share ideas and benefit from these broader prevention approaches.

7.5 STRATEGY 5

As mentioned previously, increasing substance abuse screening and referral to treatment is a fairly recent addition to the Arizona Rx Drug Initiative, so only a limited amount of work was done on this strategy during the pilot period of the Initiative. In June 2012, the Substance Use Screenings, Brief Interventions and Referrals to Treatment (SBIRT) program was implemented in five northern Arizona counties (Apache, Coconino, Mohave, Navajo, and Yavapai) in an effort to effectively identify those who may be most at-risk for substance abuse, reduce and prevent problematic use and dependence on illicit substances and alcohol, as well as provide early intervention and treatment services to those most at risk of developing, or those living with, substance use disorders. Through the use of standardized screening instruments, including the Alcohol Use Disorders Test (AUDIT) and Drug Abuse Screening Test (DAST), participating healthcare professionals assess all patients over the age of 18 for at-risk substance use behaviors. In the event that the assessment yields a positive result, the provider will then employ a discussion surrounding substance use, all while utilizing motivational interviewing techniques to provide feedback and guidance, and refer to more extensive treatment if necessary. It is hoped that through continued commitment to program implementation, as well as a thorough understanding of the procedures, screening tools, and motivational interviewing practices, this program will aid in steering at-risk patients to appropriate treatment alternatives, potentially preventing the occurrence of more severe consequences.

Moving forward, further attempts will be made to ensure prescribers have the right kind of information to assist screening and referral of patients into the appropriate level of substance abuse treatment. In addition, other considerations for strategy five include disseminating outreach and education material on medically assisted treatment and the potential expansion of Naloxone kits in Arizona.

7.6 COALITION EXPERIENCES: LESSONS LEARNED FROM THE LOCAL LEVEL

In addition to the evaluation findings included in this report, hearing the success stories and lessons learned from the coalition members who were doing the work “in their own backyards” adds another perspective on the efficacy of the Initiative.

MATFORCE

Success Stories:

“It has been a privilege and an honor for Yavapai County to be the first test site for the Rx Misuse and Abuse Reduction Initiative in Arizona. The experience has been fulfilling and rewarding. There have been many benefits in implementing the Initiative but first and foremost is the positive result of reducing Rx misuse and abuse. We know that through the combined efforts of state and local agencies, the ultimate result has been that lives have been saved.”

“There have been many additional benefits to MATFORCE as a coalition implementing the Rx Initiative. The Initiative is implemented through a community-based approach with all sectors working together. This community-based approach has resulted in MATFORCE having an overall increased capacity to implement strategies. Through implementation of the Initiative, MATFORCE has built or strengthened its relationship with over 500 entities and organizations from the medical community, law enforcement, schools, businesses, senior serving organizations, youth serving organizations, treatment community, recovery community, media partners, and the faith-based community.”

“Working with the Arizona Criminal Justice Commission and Shana Malone has been remarkable. The level of professionalism, intelligence, passion and follow through exhibited by Shana is unmatched.”

“I sincerely hope that this model of collaboration between the state and local agencies and working at a grass roots level will be replicated by the State of Arizona to address future challenges.”

Lessons Learned:

1. Find and recruit members of the medical field and other sectors to be your champions.
2. Don't be afraid to ask for what you need to be successful.
3. Utilize the resources that have already been developed and are available in the Rx Tool Kit.
4. Saving lives is worth your effort!

THE CASA GRANDE ALLIANCE

“The CGA felt supported and assisted by the state. The model gave us succinct guidelines to follow when the Initiative rolled out. It not only strengthened relationships in Pinal County, but also other counties as we collaborated and shared ideas. The success of this Initiative, I believe, was based on the relationships we formed while implementing this model and the passion of those involved.”

GRAHAM COUNTY SUBSTANCE ABUSE COALITION

“As the third county of the Arizona Prescription Drug Initiative it has been an honor and privilege to work under the leadership of Shana Malone, Senior Research Analyst for the Arizona Criminal Justice Commission. Although Graham County has been addressing prescription drugs for over nine years, until we became part of the prescription drug Initiative it became evident that as a coalition we had not explored other avenues to reduce prescription drug misuse and abuse. The pilot project promoted cohesiveness between all community sectors by providing these sectors with information and resources.”

Lesson Learned:

1. Important to have open communication with the medical sector including dentists and the county coroner.
2. There are other communities addressing the same issues and it was nice to be able to share resources and information.
3. Not everyone is willing to step up to the plate to assist in the reduction of prescription drug misuse/abuse.

8 SUMMARY AND DISCUSSION

Although the lack of funding did limit the scope and rigor of the evaluation model, the important take-away is that the minimal funds neither limited the rigor of the implementation process nor the efficacy of the results. Despite the fact that not all data is yet available to conduct an exhaustive set of pre-post impact measures, the currently available data clearly demonstrate two things: (1) the Initiative strategies, goals, objectives, and action items produce significantly effective results in the intended direction; and (2) for most measures, the results are significantly better in areas that exhaustively implemented all five strategies and corresponding action items simultaneously. The latter is somewhat of a cautionary tale for those considering partial implementation of the model. To

achieve the profound results and to ensure sustainability at an environmental or population level – the entire model must be implemented. A “surround sound” effect that incorporates state and local level efforts, and efforts to address the supply and demand side at the same time is truly the key to success.

The first demonstrated point about results in the intended direction is important for determining the return on investment of the related inputs (i.e., financial and social investment) relative to the outputs of misuse rates, morbidity, and mortality. With a little over \$500,000 and approximately 12,000 man hours of all persons involved, the payoff is clear in the youth reduction rates as high as 37 percent, 18 percent reductions in non-fatal inpatient hospitalizations, and certainly the 28 percent reduction in opioid-related deaths. In short, the Arizona Rx Drug Misuse and Abuse Initiative model is a highly effective model for saving lives and curbing the prescription drug problem facing Arizona. As the Arizona model emerges and evolves across the state and as others consider implementing the model, it will be important for all involved to take one final lesson from the Initiative partners – being prepared, persistent, and patient are three elements critical for the success of this work. Though complex and rigorous, the investment is well worth the effort in our goal to make Arizona a happier, healthier, and safer place to live.

9 ARIZONA RX DRUG MISUSE AND ABUSE CORE GROUP

Arizona Board of Pharmacy
Arizona Criminal Justice Commission
Arizona Department of Health Services
Arizona Health Care Cost Containment System
Arizona Board of Osteopathic Examiners
Prevention Works AZ
Arizona Substance Abuse Partnership
Governor's Office for Children, Youth and Families

10 RESOURCES AND CONTACTS

Arizona Rx Drug Misuse and Abuse website <http://www.azcjc.gov/acjc.web/rx/default.aspx> or contact:

- Sheila Sjolander (Initiative co-chair): Sheila.Sjolander@azdhs.gov
- Karen Ziegler (Initiative co-chair): kziegler@azcjc.gov
- Tammy Paz-Combs (GOCYF contact): tcombs@az.gov
- Jeanne Blackburn (ASAP contact): Jblackburn@az.gov
- Phil Stevenson (evaluation): pstevenson@azcjc.gov
- Shana Malone (county-level strategies): smalone@azcjc.gov
- Dean Wright (CSPMP): DWright@azphamecy.gov
- Shelly Mowrey (prevention): shellymowreymail@gmail.com
- Tomi St. Mars (prescriber education): Tomi.St.Mars@azdhs.gov
- ASAP - <http://gocyf.az.gov/CommGroups/ASAP.asp>
- MATFORCE - <http://www.matforce.org/>
- Pinal County Substance Abuse Council - <http://www.pcsac.org/>
- Casa Grande Alliance - <http://www.casagrandealliance.org/>
- Graham County Substance Abuse Coalition - <https://www.facebook.com/grahamcountysubstanceabusecoalition>
- Greenlee County Substance Abuse Coalition - <https://www.facebook.com/GreenleeCountySubstanceAbuseCoalition>
- AZ Dept. of Health Services Director's Blog - <http://directorsblog.health.azdhs.gov/>
- Arizona Community Data Project - <http://www.bach-harrison.com/arizonadataproject/indicators.aspx>
- Bureau of Public Health Statistics – Community Profiles Dashboard - <http://www.azdhs.gov/phs/phstats/profiles/index.php>
- SAMHSA - SBIRT: Screening, Brief Intervention, and Referral to Treatment <http://www.samhsa.gov/sbirt>

11 REFERENCES

- Arizona Computerized Criminal History Record System (2014). *DUI-D Data* [Data file].
- The Arizona Department of Health Services. (2014). *Poisonings among Arizona residents, 2012*. Retrieved from <http://www.azdhs.gov/phs/owch/pdf/injuryprevention/poisonings-among-arizona-residents-2012.pdf>
- The Arizona Department of Health Services. (2014). *Vital Statistics Data* [Data file].
- Arizona State Board of Pharmacy. (2013). Controlled Substances Prescription Monitoring Program [Data file].
- Association of State and Territorial Health Officials (2014) Retrieved from <http://www.astho.org/>
- Behavioral Health Coordinating Committee: Prescription Drug Abuse Subcommittee (2013). *Addressing prescription drug abuse in the United States: Current activities and future opportunities*. Retrieved from http://www.cdc.gov/HomeandRecreationalSafety/pdf/HHS_Prescription_Drug_Abuse_Report_09.2013.pdf
- Centers for Disease Control and Prevention. (2014). *Prescription drug overdose in the United States: Fact sheet*. Retrieved from <http://www.cdc.gov/homeandrecreationalafety/overdose/facts.html>
- Gosin, M., Marsiglia, F. F., & Hecht, M. L. (2003). Keepin' it REAL: A drug resistance curriculum tailored to the strengths and needs of pre-adolescents of the Southwest. *The Journal of Drug Education*, 33, 119-142.
- Hussaini, S. K. (2014). *Neonatal abstinence syndrome: 2008-2013 overview*. Arizona Department of Health Services Research Brief. Retrieved from <http://www.azdhs.gov/phs/phstats/meddir/pdf/neonatal-abstinence-syndrom-research.pdf>
- Inflexxion, Inc, (2008) *Screener and Opioid Assessment for Patients with Pain (SOAPP)® Version 1.0-14Q*. Retrieved from <http://nhms.org/sites/default/files/Pdfs/SOAPP-14.pdf>
- Johnston, L. D., O'Malley, P. M., Bachman, J. G., Schulenberg, J. E., & Miech, R. A. (2014). *Monitoring the Future national survey results on drug use, 1975-2013: Volume I, Secondary school students*. Ann Arbor: Institute for Social Research, The University of Michigan, 630 pp.
- Partners Against Pain (n.d.) *Opioid Risk Tool*. Retrieved from http://www.partnersagainstpain.com/printouts/Opioid_Risk_Tool.pdf
- The Partnership at Drugfree.org (2013). *PACT360*. Retrieved from <http://pact360.org>
- PDMP Center of Excellence at Brandeis University (2014). *Guidance on PDMP best practices: Options for unsolicited report*. Retrieved from http://www.pdmpexcellence.org/sites/all/pdfs/Brandeis_COE_Guidance_on_Unsolicited_Reporting_final.pdf
- Prescription drug diversion: Combating the scourge*. Subcommittee on Commerce, Manufacturing and Trade. Committee on Energy and Commerce. United State House of Representatives. (2012). (Testimony of Joseph T. Rannazzi).
- St. Luke's Health Initiatives (2010). Arizona Health Survey [Data file]
- Substance Abuse and Mental Health Services Administration (n.d.). *Behavioral Health Treatment Services Locator*. Retrieved from <https://findtreatment.samhsa.gov/>
- U.S. National Library of Medicine (2014). *Neonatal abstinence syndrome*. Retrieved from <http://www.nlm.nih.gov/medlineplus/ency/article/007313.htm>

12 APPENDICES

12.1 APPENDIX 1: ARIZONA RX DRUG MISUSE AND ABUSE INITIATIVE-IMPLEMENTATION PLAN

12.2 APPENDIX 2: PROCESS, IMPACT, AND OUTCOME EVALUATION MEASURES

12.3 APPENDIX 3: ARIZONA RX DRUG MISUSE AND ABUSE INITIATIVE DATA SOURCES



APPENDIX 1:

ARIZONA Rx DRUG MISUSE AND ABUSE INITIATIVE – IMPLEMENTATION PLAN

ARIZONA SUBSTANCE ABUSE PARTNERSHIP Governor's Office for Children, Youth and Families



ARIZONA SUBSTANCE ABUSE PARTNERSHIP ARIZONA Rx DRUG MISUSE AND ABUSE INITIATIVE – IMPLEMENTATION PLAN



Introduction

The Arizona Rx Drug Misuse and Abuse Initiative (Initiative) was conceived as a way to combat the growing epidemic of prescription (Rx) drug misuse and abuse in Arizona. The Initiative began after the Governor's Office for Children, Youth and Families and the Arizona Criminal Justice Commission hosted a Prescription Drug Expert Panel in February 2012. Experts from the medical, treatment, law enforcement, and community prevention sectors formulated a set of data-and-research-driven strategies to be implemented in an attempt to stem the growing tide of Rx drug misuse and abuse and the related negative consequences in Arizona. These strategies, adapted and evolved from those originally proposed by Office of Drug Control Policy (ONDCP), are a multi-systemic approach to the Rx drug misuse and abuse epidemic in Arizona that provide a simultaneous top-down and bottom-up approach between state agencies and community-level efforts.

This implementation plan was created in order to provide guidance for the execution of the Arizona Rx Drug Misuse and Abuse Initiative model. The strategies, goals, objectives and action items listed herein have all been successfully piloted in three geographic areas in Arizona, with substantial data to demonstrate the efficacy of the model. The objectives and action steps were formulated in accordance with the strategies, and they are intended to provide an overall roadmap and direction for the Initiative as it is implemented and progresses. To increase applicability to the diverse communities and populations in Arizona, there are considerable opportunities in the model for localizing the action items to account for the methods that will be most salient to individual communities.

In order to monitor progress, identify emerging issues and to ensure effective iterative feedback between state and local efforts, two critical core groups were established that include pivotal state and local leaders. The statewide core group meets bi-monthly and consists of members from the Governor's Office for Children, Youth and Families, the Arizona Criminal Justice Commission, the Department of Health Services (Divisions of Public Health and Behavioral Health), the Arizona State Board of Pharmacy, the Arizona Board of Osteopathic Examiners in Medicine and Surgery, the Arizona Health Care Cost Containment System, and



ARIZONA SUBSTANCE ABUSE PARTNERSHIP ARIZONA Rx DRUG MISUSE AND ABUSE INITIATIVE – IMPLEMENTATION PLAN

Prevention Works AZ, LLC. The community core groups meet quarterly and consist of local community coalition leaders. Information exchange between groups is provided by a project coordinator that attends both the statewide and community core group meetings and helps align efforts at each level. Additional support for sharing information between implementation sites is provided by state and local web-based repositories that contain tools and resources developed by state and local partners, many of which can be tailored to each site.

Prior to implementing the model, there are two major factors to consider. The first is to identify a local champion in each sector of the model (i.e., medical, treatment, law enforcement, and community prevention). The second is to identify a spokesperson that can communicate with media representatives. These two factors have been identified as key elements by the ongoing Initiative participants and the statewide core group for maximizing the credibility, efficiency and ease of successfully implementing the Arizona Rx Drug Misuse and Abuse Initiative model.

The misuse and abuse of prescription drugs in Arizona is a significant problem with very serious consequences. The Arizona Rx Drug Misuse and Abuse Initiative model is an established method for state agencies, community coalitions, and stakeholders across Arizona to effectively collaborate towards our common goal of reducing prescription drug misuse and abuse in Arizona, and in doing so, improve the health outcomes for all people living in Arizona.



**ARIZONA SUBSTANCE ABUSE PARTNERSHIP
ARIZONA Rx DRUG MISUSE AND ABUSE INITIATIVE – IMPLEMENTATION PLAN**

STRATEGY #1: Reduce illicit acquisition and diversion of Rx drugs.

GOAL #1: Increase the use of proper disposal methods for Rx drugs.

OBJECTIVES

1. Place permanent Rx drug drop boxes in every law enforcement station/substation. Identify other DEA approved sites (e.g., hospitals with pharmacies) for additional placement opportunities.

**STATE and
COMMUNITY
ACTION
STEPS**

1. Obtain commitment from law enforcement agencies to house Rx drug drop boxes
2. Obtain resources to buy Rx drug drop boxes
3. Develop written policies that describe law enforcement agencies' roles and responsibilities for Rx drugs placed in drop boxes
4. Install permanent Rx drug drop boxes

2. Increase community awareness of Rx drug drop box locations.

**COMMUNITY
ACTION
STEPS**

1. Develop community education messaging and materials to increase community awareness of the importance of proper Rx drug and over-the-counter (OTC) disposal and the Rx drug drop box locations
2. Identify mode and audience for messaging and material dissemination; see Appendix 1 for examples
3. Disseminate messaging and materials



**ARIZONA SUBSTANCE ABUSE PARTNERSHIP
ARIZONA Rx DRUG MISUSE AND ABUSE INITIATIVE – IMPLEMENTATION PLAN**

3. Implement Rx drug take-back events.

COMMUNITY ACTION STEPS	1. Develop a replicable plan for Rx drug take-back events with local law enforcement
	2. Identify timing, locations, and partners for Rx drug take-back events
	3. Increase community awareness of the importance of proper Rx and over-the-counter (OTC) drug disposal and the timing and location of take-back events
	4. Hold scheduled take-back events
	5. Reassess need for take-back events as Rx drug drop boxes are put in place

GOAL #2: Increase the use of proper storage methods for Rx drugs in the home.

OBJECTIVES

1. Increase community awareness of safe Rx drug storage options.

COMMUNITY ACTION STEPS	1. Develop community education messaging and materials to increase awareness of the importance of safe Rx drug storage and provide examples of safe Rx drug storage options
	2. Identify mode and audience for messaging and material dissemination; see Appendix 1 for examples
	3. Disseminate messaging and materials



**ARIZONA SUBSTANCE ABUSE PARTNERSHIP
ARIZONA Rx DRUG MISUSE AND ABUSE INITIATIVE – IMPLEMENTATION PLAN**

STRATEGY #2: Promote responsible prescribing and dispensing policies and practices.

GOAL #1: Provide education and training for prescribers, pharmacists and their patients.

OBJECTIVES

1. Encourage prescriber and pharmacist adoption of Best Practice Guidelines (i.e., the Arizona Guidelines for Emergency Department Controlled Substance Prescribing; the Arizona Opioid Prescribing Guidelines; and the Arizona Guidelines for Dispensing Controlled Substances).

**STATE and
COMMUNITY
ACTION
STEPS**

1. Partner with regulatory boards, professional associations, insurance companies, and health systems to be a direct source for disseminating and promoting the Guidelines
2. Emergency Department (ED) Guidelines: Meet with independent and corporate hospital/ED administration, medical directors, department heads, and staff to discuss the Rx drug abuse problem, the importance of guidelines, and ways to partner
3. Identify state and local venues to raise prescriber and pharmacist awareness and conduct Guideline and/or special topics training
4. Use letters, email blasts, and local door-to-door approaches to disseminate copies of the Guidelines; provide brief awareness training and request policy adoption

2. Promote continuing education for prescribers and pharmacists on prescribing and dispensing controlled substances.

**STATE and
COMMUNITY
ACTION
STEPS**

1. Partner with Boards, Associations, and Academic Institutions to provide and market Continuing Medical Education (CME) credits
2. Utilize local prescriber newsletters, local print media, and door-to-door approaches in order to market CMEs in the community



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3. Increase prescriber and dispenser education regarding Morphine Equivalent Daily Dose (MEDD) and other indicators of potentially risky Rx drug use

3. Provide patient education training and materials for prescribers and pharmacists to improve the prescription drug literacy of their patients (e.g., side effects, risks, alternatives, adherence to treatment, realistic pain management expectations, proper storage, and disposal).

**STATE and
COMMUNITY
ACTION
STEPS**

1. Prepare and disseminate patient education materials (e.g., flyers, pamphlets, informational sheets, posters, and rolling or streamed videos) to local hospitals, emergency departments, community health centers, pharmacies, and local healthcare offices
2. Identify state and local venues to conduct prescriber and pharmacist training on effective patient education and how to balance legitimate pain needs
3. House patient education materials on state and local Rx Drug Abuse Resource Repository websites

GOAL #2: Increase prescriber and pharmacist use of the Controlled Substances Prescription Monitoring Program (CSPMP).

OBJECTIVES

1. Implement a “Sign Up to Save Lives” campaign to increase awareness of the CSPMP tool and to get prescribers and pharmacists signed up and using the system.

**STATE and
COMMUNITY
ACTION
STEPS**

1. Partner with regulatory boards, professional associations, insurance companies, and health plans to be a direct source for promoting use of the CSPMP
2. Use traditional and social media to market the use of the CSPMP as a patient safety tool, best practice standard, and a mechanism to reduce liability



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	<ol style="list-style-type: none"> Market new office designee and 24-hour reporting legislation (i.e., SB1124) as easier, accurate, and more timely for prescribers and pharmacists
	<ol style="list-style-type: none"> Obtain current registration lists from the Board of Pharmacy and use personal correspondence and local door-to-door approaches to encourage prescribers to sign up and use the CSPMP
	<ol style="list-style-type: none"> Identify state and local venues to conduct prescriber and pharmacist training on use of the CSPMP
2.	Recognize and/or reward CSPMP sign up and use.
STATE and COMMUNITY ACTION STEPS	<ol style="list-style-type: none"> Provide a personalized thank you from the local substance abuse coalition to all prescribers who sign up for the CSPMP in their service area
	<ol style="list-style-type: none"> Provide “Sign up to Save Lives” reports to regulatory boards, associations, insurance companies, and health plans that detail progress in CSPMP sign up and use

GOAL #3: Increase awareness of individualized prescribing habits.

OBJECTIVES

1.	Generate quarterly report cards summarizing prescriber’s controlled substance II-IV scripts and pills dispensed and high-risk patients (e.g., those that exceed 100 MMEDDs) compared to other prescribers of their specialty type.
STATE ACTION STEPS	<ol style="list-style-type: none"> Analyze CSPMP data – categories include Hydrocodone, Oxycodone, Other Pain Relievers, Benzodiazepines, Carisoprodol, and aggregate Controlled Substances
	<ol style="list-style-type: none"> Identify and flag outliers



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3. Disseminate to the individual prescriber with language reinforcing responsible prescribing and use of the CSPMP

4. Use aggregate outlier data to engage state regulatory boards and professional organizations about progress or identified concerns around prescribing habits by geographic service area or specialty provider type



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STRATEGY #3: Enhance Rx drug practice and policies in law enforcement.

GOAL #1: Provide education and training for law enforcement officers.

OBJECTIVES

1. Educate officers about the prevalence of Rx drug misuse and abuse and Rx drug diversion crimes.

STATE and COMMUNITY ACTION STEPS	1. Schedule training events
	2. Implement POST-certified Rx drug trainings offered by the Arizona High Intensity Drug Trafficking Area (HIDTA) and the Governor's Office of Highway Safety

2. Educate officers about pill recognition, use of poison control, how to read prescriptions and bottles, Rx drug street sales/trafficking, and related crime, including Driving Under the Influence of Drugs (DUI-D).

STATE and COMMUNITY ACTION STEPS	1. Schedule training events
	2. Implement POST-certified Rx drug training offered by the HIDTA and the Governor's Office of Highway Safety

GOAL #2: Increase law enforcement use of the Controlled Substances Prescription Monitoring Program (CSPMP).

OBJECTIVES

1. Increase the number of law enforcement personnel that have signed up for the CSPMP, to include at least one law enforcement officer from every law enforcement agency in the state.

STATE and COMMUNITY ACTION STEPS	1. Meet with local law enforcement agencies and state organizations/associations representing law enforcement to gain buy-in
	2. Provide education and training on CSPMP registration and use to local law enforcement



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2. Increase the number of sworn or civilian personnel in law enforcement agencies that use the CSPMP.

**STATE and
COMMUNITY
ACTION
STEPS**

1. Meet with local law enforcement agencies and state organizations/associations representing law enforcement to gain buy-in
2. Provide education and training on CSPMP access and use

3. Have 100% participation on the use of the CSPMP by multi-jurisdictional drug task forces.

**STATE and
COMMUNITY
ACTION
STEPS**

1. Meet with drug task-forces to gain buy-in
2. Provide education and training on CSPMP access and use
3. Implement state-level grant criteria that requires use of the CSPMP for all new funds for Rx drug task forces

GOAL #3: Improve coding structure of data management systems for tracking Rx drug offenses.

OBJECTIVES

1. Add a code to arrest information that flags Rx drug-related crimes.

**COMMUNITY
ACTION**

1. Meet with law enforcement agencies to obtain buy-in

STEPS

2. Develop flagging process for crimes that are Rx drug-related
3. Implement flagging process for crimes that are Rx drug-related



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STRATEGY #4: Increase public awareness and patient education about Rx drug misuse.

GOAL #1: Create a sense of urgency in the general public about the risks of Rx drug misuse.

OBJECTIVES

1. Implement mass media and material dissemination.

COMMUNITY ACTION STEPS

1. Develop community education messaging and materials to increase awareness of the risks of Rx drug and over-the-counter (OTC) drug misuse and abuse (see Appendix for content specific examples)
2. Identify mode and audience for messaging and material dissemination; see Appendix 1 for examples
3. Disseminate messaging and materials

GOAL #2: Implement the Rx 360° (Drug Free America, research-based) curriculums to educate youth, parents, grandparents and other community adults about the risks of Rx drug misuse and how to teach youth strategies that increase their resilience to Rx drug misuse.

OBJECTIVES

1. Conduct Rx 360° Speakers Bureau training for localized and adapted versions of the youth, parent and community Rx 360 modules.

COMMUNITY ACTION STEPS

1. Adapt current Rx 360° curriculum for specific geographic service areas
2. Identify local speakers



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3. Train local speakers using the approved Rx 360° state trainer

2. Identify target populations in the geographic service area that maximizes the depth and breadth of the model reach.

COMMUNITY ACTION STEPS

1. Partner with local schools to develop and implement a dissemination plan to reach youth in grades 6-12

2. Partner with schools, civic organizations, probation, faith-based organizations, tribes, agencies serving older adults, perinatal groups, veterans/military families, local businesses, etc. to develop and implement the parent and community member dissemination plan

3. Partner with the County Public Health Department to develop and implement a dissemination plan for adults through workplace initiatives, home visiting, school health, and chronic disease programs



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STRATEGY #5: Enhance assessment and referral to substance abuse treatment.

GOAL #1: Increase awareness about substance abuse screening models, treatment options, and how to access treatment services.

OBJECTIVES

1. Increase awareness of Rx drug screening tools and available models.

COMMUNITY ACTION STEPS

1. Disseminate information about the Screening, Brief Intervention, and Referral to Treatment (SBIRT) model as an early intervention opportunity to community health centers, hospitals, primary care offices, and other medical settings; See Appendix 1 for examples
2. Use letters, email blasts, and local door-to-door approaches to disseminate copies of the materials to local prescribers

2. Increase awareness of how to access treatment services.

COMMUNITY ACTION STEPS

1. Disseminate information about how to use the Substance Abuse and Mental Health Services Administration's (SAMHSA) treatment locator and the Arizona Department of Health Services' decision-tree to prescribers, probation and parole officers, and the general public



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Appendix 1: Examples and Resource List for Implementation Plan

Strategy 1: Reduce Illicit Acquisition and Diversion of Pharmaceutical Drugs

Goal 1, Objective 2, Action Step 2.

Identify mode and audience for messaging and material dissemination; see below for examples

<i>Mode and Audience</i>	<i>Tools</i>
<input type="checkbox"/> Partner with local media to run PSAs	<input type="checkbox"/> Pamphlets
<input type="checkbox"/> Partner with Schools <ul style="list-style-type: none"> o Parent Night o Parent-Teacher Conferences o Parent email blasts 	<input type="checkbox"/> Flyers <input type="checkbox"/> Posters <input type="checkbox"/> Television
<input type="checkbox"/> Pharmacies and Healthcare Offices	<input type="checkbox"/> Radio
<input type="checkbox"/> Public Libraries	<input type="checkbox"/> Print media
<input type="checkbox"/> Community events	<input type="checkbox"/> Social media (Facebook, Twitter)
<input type="checkbox"/> Specialized groups	<input type="checkbox"/> Coalition websites
<ul style="list-style-type: none"> o Hospice providers <ul style="list-style-type: none"> o Realtors 	<input type="checkbox"/> Newsletters
<ul style="list-style-type: none"> o Funeral homes 	<input type="checkbox"/> Magnets
<ul style="list-style-type: none"> o Older adults <ul style="list-style-type: none"> o Parents 	<input type="checkbox"/> Postcards
<ul style="list-style-type: none"> o Veterans/military families 	<input type="checkbox"/> PowerPoint presentations
<ul style="list-style-type: none"> o Native Americans 	



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Goal 2, Objective 1, Action Step 2.

Identify mode and audience for messaging and material dissemination; see below for examples

Mode and Audience

- Partner with local media to run PSAs
- Partner with Schools
 - o Parent Night
 - o Parent-Teacher Conferences
 - o Parent email blasts
 - o School nurses' offices
 - o Attached to forms for parents to complete for their children to be administered medications at school
- Pharmacies and Healthcare Offices
- Public Libraries
- Community events
- Specialized groups
 - o Hospice providers
 - o Realtors
 - o Funeral homes
 - o Older adults
 - o Parents
 - o Veteran/military families
 - o Native Americans
- Block watches
- "Night-Out" events
- School-based clinics
- Integrated behavioral health clinic
- Community Action Programs

Tools

- Pamphlets
- Flyers
- Posters
- Television
- Radio
- Print media
- Social media (Facebook, Twitter)
- Newsletters
- Magnets
- Postcards
- PowerPoint presentations
- Coalition websites
- Signage on dumpsters
- Landfills signage



Strategy 4: Increase Public Awareness and Patient Education and Rx Drug Misuse

Goal 1, Objective 1, Action Step 2.

Identify mode and audience for messaging and material dissemination; see below for examples

<u>Mode and Audience</u>	<u>Tools</u>
<ul style="list-style-type: none"> <input type="checkbox"/> Partner with local media to run PSAs <input type="checkbox"/> Partner with Schools <ul style="list-style-type: none"> o Parent Night o Parent-Teacher Conferences o Parent email blasts <input type="checkbox"/> Pharmacies and Healthcare Offices <input type="checkbox"/> Public Libraries <input type="checkbox"/> Community events <input type="checkbox"/> Specialized groups <ul style="list-style-type: none"> o Older adults o Parents o Youth o Veterans/military families o Native Americans <input type="checkbox"/> Rx Drug Patient Safety Toolkits to educate population groups about risks, pain management expectations available alternatives, proper storage and disposal and adherence to treatment 	<ul style="list-style-type: none"> <input type="checkbox"/> Pamphlets <input type="checkbox"/> Flyers <input type="checkbox"/> Posters <input type="checkbox"/> Television <input type="checkbox"/> Radio <input type="checkbox"/> Print media <input type="checkbox"/> Social media (Facebook, Twitter) <input type="checkbox"/> Newsletters <input type="checkbox"/> Magnets <input type="checkbox"/> Postcards <input type="checkbox"/> PowerPoint presentations <input type="checkbox"/> Coalition websites

Strategy 5: Enhance Assessment and Referral to Substance Abuse Treatment

Goal 1, Objective 1, Action Step 1.

Develop treatment resource information for prescribers to use to navigate their patients into substance abuse treatment when necessary; example tools include:

- Signs of Rx Addiction Checklist (prescriber, patient and youth/parent versions)
- Opioid Risk Tool (ORT)
- Screener and Opioid Assessment for Patients in Pain (SOAPP)
- Information on the Screening, Brief Intervention and Referral to Treatment (SBIRT) model

Goal 1, Objective 2, Action Step 1.

Develop treatment resource information for prescribers to use to navigate their patients into substance abuse treatment when necessary; example tools include:

- Decision-trees for when and where to refer patients to substance abuse treatment
- Service type capacity for Detox services
- Access to substance abuse treatment options through the Affordable Care Act
- Medication-Assisted Treatment

APPENDIX 2: PROCESS, IMPACT AND OUTCOME EVALUATION MEASURES

Arizona Rx Drug Misuse and Abuse Initiative: Process, Impact and Outcome Evaluation Methodology									
PROCESS EVALUATION MEASURES									
Measure Name	Strategy, Goal	Type of Measure	How Measured	When Measured	By Whom	Data Source	Expected Change	Pre-Post Analysis Type	
Rx360 Youth Curriculum	S4, G2	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	Community	Event Speakers	N/A	N/A	
Rx360 Parent Curriculum	S1, G1 & G2 S4, G2	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	Community	Event Speakers	N/A	N/A	
Rx360 Community Curriculum	S1, G1 & G2 S4, G2	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	Community	Event Speakers	N/A	N/A	
Law Enforcement Diversion Crimes and Rx Drug Recognition Training	S3, G1 & G2	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	State (Arizona Criminal Justice Commission)	HIDTA; GOHS Event Trainers	N/A	N/A	
Clinical Best Practice Training	S2, G1 & G2	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	State (All Arizona Rx Initiative Agencies)	Event Speakers	N/A	N/A	
Community Events and Trainings	All	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	Community	Event Speakers	N/A	N/A	
Door-to-Door Trainings/Contact	S2, G1 & G2	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	Community	Event Implementers	N/A	N/A	
Rx Drug Take Back Events and Drop Box Placement	S1, G1	Quantitative: Tally	Number of take-back events and number of boxes	Per Event; tallied quarterly	Community and State (Arizona Criminal Justice Commission)	Police Departments	N/A	N/A	
Public Awareness and Patient Education Material	S1, G1 & G2 S2, G1 S4, G1 S5, G1	Quantitative: Tally	Number of events/modes and number of individuals directly reached; tracked per content or audience type	Per Event; tallied quarterly	Community and State (All Arizona Rx Initiative Agencies)	Event Implementers	N/A	N/A	
Prescriber and Pharmacist Resources, Tools and Brief Education Material	S2, G1 & G2	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	Community and State (All Arizona Rx Initiative Agencies)	Event Implementers	N/A	N/A	
Best Practice Guideline Dissemination	S2, G1	Quantitative: Tally	Number of events and number of individuals directly reached	Per Event; tallied quarterly	Community and State (All Arizona Rx Initiative Agencies)	Event Implementers	N/A	N/A	
Prescriber Report Cards	S2, G3	Quantitative: Tally	Number of report cards distributed (direct reach)	Quarterly	State (Arizona State Board of Pharmacy and Arizona Criminal Justice Commission)	Controlled Substance Prescription Monitoring Program (CSPMP)	N/A	N/A	
IMPACT EVALUATION MEASURES									
Measure Name	Related Strategy	Type of Measure	How Measured	When Measured	By Whom	Data Source	Expected Change	Pre-Post Analysis Type	
<i>Supply Side</i>									
CSPMP Sign Ups to Use the System (Prescribers, Pharmacists, Law Enforcement)	S2, G2	Quantitative: Database	Percent out of total population	Monthly	State Board of Pharmacy; Analyzed by the Arizona Criminal Justice Commission	Controlled Substance Prescription Monitoring Program (CSPMP)	Increase	Percent Change	
CSPMP Active Queries of the System (Prescribers)	S2, G2	Quantitative: Database	Raw number (Note: percent out of total scripts written was attempted but was dropped due to inability to determine what percentage out of all scripts should require a query)	Quarterly	State Board of Pharmacy; Analyzed by the Arizona Criminal Justice Commission	Controlled Substance Prescription Monitoring Program (CSPMP)	Increase	Percent Change	
Controlled Substance Prescriptions Dispensed to Arizona Residents	S2, G1, G2, & G3	Quantitative: Database	Rate per 100,000 population	Quarterly	State Board of Pharmacy; Analyzed by the Arizona Criminal Justice Commission	Controlled Substance Prescription Monitoring Program (CSPMP)	Decrease	Percent Change	
Controlled Substance Pills Dispensed to Arizona Residents	S2, G1, G2, & G3	Quantitative: Database	Rate per 100,000 population	Quarterly	State Board of Pharmacy; Analyzed by the Arizona Criminal Justice Commission	Controlled Substance Prescription Monitoring Program (CSPMP)	Decrease	Percent Change	
Controlled Substance Pills per Prescription Dispensed to Arizona Residents	S2, G1, G2, & G3	Quantitative: Database	Ratio of pills per prescriptions dispensed	Quarterly	State Board of Pharmacy; Analyzed by the Arizona Criminal Justice Commission	Controlled Substance Prescription Monitoring Program (CSPMP)	Decrease	Percent Change	
Prescribers with Outlier Prescribing Patterns	S2, G1, G2, & G3	Quantitative: Database	Percent out of total population prescribing > 1, 2 and 3 SD above the mean for their specialty type	Quarterly	State Board of Pharmacy; Analyzed by the Arizona Criminal Justice Commission	Controlled Substance Prescription Monitoring Program (CSPMP)	Decrease	Percent Change	
Prescribers with Patients Exceeding Opioid Risk Threshold	S2, G1, G2, & G3	Quantitative: Database	Percent out of total population exceeding 100 Morphine Equivalent Daily Doses (state, county, prescriber and specialty type analyses)	Quarterly	State Board of Pharmacy; Analyzed by the Arizona Criminal Justice Commission	Controlled Substance Prescription Monitoring Program (CSPMP)	Decrease	Percent Change	

APPENDIX 2: PROCESS, IMPACT AND OUTCOME EVALUATION MEASURES

Prescribers with Patients Receiving Dangerous Drug Combinations	S2, G1, G2, & G3	Quantitative: Database	Percent out of total population exceeding 100 Morphine Equivalent Daily Doses (state, county, prescriber and specialty type analyses)	Quarterly	State Board of Pharmacy; Analyzed by the Arizona Criminal Justice Commission	Controlled Substance Prescription Monitoring Program (CSPMP)	Decrease	Percent Change
Prescriber and Dispenser Attitudes, Knowledge, Awareness and Beliefs: Pain Patients; Current Policies; CSPMP; Tool/Resources Needed	S2, G1, G2, & G3	Qualitative: Key-Informant Interview	Content (Theme) Analysis	Per Event; Formative or Post-Program	Community; Analyzed by the Arizona Criminal Justice Commission	Prescriber and Dispenser Rx Drug Misuse Key-Informant Interview Protocol	N/A	N/A
Demand Side								
Adult (Parent; Community) Perception of Rx Drug Misuse as a Problem	S4, G2	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Increase	Between Group Comparison (t-test); Percent Change to Positive
Adult (Parent; Community) Perceived Risk of Misusing Rx Drugs (Global and Relative to "Street Drugs")	S4, G2	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Increase	Between Group Comparison (t-test); Percent Change to Positive
Adult (Parent; Community) Knowledge of Methods for Safe Storage of Rx Drugs	S4, G2	Quantitative: Survey	Percent out of participant population with correct answer	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Increase	Correct Response Test (Mann Whitney U-Test)
Adult (Parent; Community) Knowledge of Proper Disposal of Rx Drugs	S4, G2	Quantitative: Survey	Percent out of participant population with correct answer	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Increase	Correct Response Test (Mann Whitney U-Test)
Adult (Parent; Community) Awareness of Permanent Rx Drug Drop Box Locations	S4, G2	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Increase	Between Group Comparison (t-test); Percent Change to Positive
Adult (Parent; Community) Awareness of Rx Drug Take-Back Events	S4, G2	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Increase	Between Group Comparison (t-test); Percent Change to Positive
Adult (Parent; Community) Attitudes and Beliefs About Acceptability of Sharing Rx Drugs	S4, G2	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Decrease	Between Group Comparison (t-test); Percent Change to Positive
Parent Attitude and Knowledge: Parent-Child Communication About the Risks of Rx Drug Misuse	S4, G2	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Increase	Between Group Comparison (t-test); Percent Change to Positive
Parent Attitudes and Knowledge: Parent-Child Communication About Resistance Strategies	S4, G2	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed quarterly	Community; Analyzed by the Arizona Criminal Justice Commission	Rx360 Parent and Community Curriculum Training Survey	Increase	Between Group Comparison (t-test); Percent Change to Positive
Youth Accessing Rx Drugs from Friends and Family	S1, G1 & G2 S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Decrease	Percent Change
Youth Perceived Consequences of Rx Drug Misuse (Physical Harm, Getting in Trouble with Parents, Peers, School or Law Enforcement)	S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth Perceived Disapproval of Rx Drug Misuse (Parent, and Peers)	S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth Perceived Use of Rx Drugs as Wrong	S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth Perceived Use of Rx Drugs as Socially Acceptable	S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Decrease	Percent Change
Youth Use of Resistance Strategies (Refuse, Explain, Avoid, Leave)	S4, G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth Exposure to Substance Abuse Messaging	S4, G1	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth at High Risk for Early Initiation of Substance Use	S1, G1 & G2 S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Decrease	Percent Change
Youth Age of Actual Initiation of Rx Drug Misuse	S1, G1 & G2 S4, G1 & G2	Quantitative: Survey	Mean age	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth Report: Parent-Child Communication About the Risks of Rx Drug Misuse	S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth Report: Parent-Child Communication About Resistance Strategies	S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth Report: Parent-Child Communication About Clear Rules and Expectations not to Misuse Rx Drugs	S4, G1 & G2	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Increase	Percent Change
Youth Attitudes and Beliefs: Rx Drug Risks; Parent and Peer Disapproval; Parent-Child Communication; Resistance Strategies; Stressors and Coping Mechanisms	S4, G1 & G2	Qualitative: Focus group	Content (Theme) Analysis	Per Event; Formative or Post-Program	Community; Analyzed by the Arizona Criminal Justice Commission	Youth Rx Drug Misuse Attitudes and Beliefs Focus Group Protocol	N/A	N/A

APPENDIX 2: PROCESS, IMPACT AND OUTCOME EVALUATION MEASURES

Law Enforcement									
Law Enforcement Perception of Rx Misuse as a Problem	S3, G1	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed cumulatively	Arizona Criminal Justice Commission	Rx Diversion Crimes Training Survey	Increase	Between Group Comparison (t-test); Percent Change to Positive	
Law Enforcement Perceived Importance of Role in Rx Drug Diversion Investigations	S3, G1 & G2	Quantitative: Survey	Mean (5 item Likert scale)	Per Event; analyzed cumulatively	Arizona Criminal Justice Commission	Rx Diversion Crimes Training Survey	Increase	Between Group Comparison (t-test); Percent Change to Positive	
Law Enforcement Knowledge of Rx Fraud Investigations	S3, G1, G2 & G3	Quantitative: Survey	Percent out of participant population with correct answer	Per Event; analyzed cumulatively	Arizona Criminal Justice Commission	Rx Diversion Crimes Training Survey	Increase	Correct Response Test (Mann Whitney U-Test)	
Law Enforcement Knowledge of Rx Drug Charging Statues	S3, G1, G2 & G3	Quantitative: Survey	Percent out of participant population with correct answer	Per Event; analyzed cumulatively	Arizona Criminal Justice Commission	Rx Diversion Crimes Training Survey	Increase	Correct Response Test (Mann Whitney U-Test)	
OUTCOME EVALUATION MEASURES									
Measure Name	Related Strategy	Type of Measure	How Measured	When Measured	By Whom	Data Source	Expected Change	Pre-Post Analysis Type	
Initial Outcomes									
Adult Past 30 Day Rx Drug Misuse and Abuse	All	Quantitative: Survey	Percent out of total population	Annually	Arizona Department of Health Services	Arizona Behavioral Risk Factors Surveillance System (BRFSS)	Decrease	Percent Change	
Youth Past 30 Day Rx Drug Misuse and Abuse	All	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Decrease	Percent Change	
Youth Past 30 Day PolySubstance Use (Alcohol+Rx Drugs)	All	Quantitative: Survey	Percent out of Rx 30 day misusers	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Decrease	Percent Change	
Final Outcomes: Public Health									
Rx Drug-Related Overdose Deaths (Global; Opioid Specific)	All	Quantitative: Database; Published Report	Rate per 100,000 population	Annually	Arizona Department of Health Services	Vital Statistics; Poisonings Among Arizona Residents Report	Decrease	Percent Change	
Emergency Department Cases Involving Opioid Abuse/Dependency	All	Quantitative: Database; Published Report	Rate per 100,000 population	Annually	Arizona Department of Health Services	Vital Statistics; Poisonings Among Arizona Residents Report	Decrease	Percent Change	
Non-Fatal Poisoning-Related Inpatient Hospitalizations	All	Quantitative: Database; Published Report	Rate per 100,000 population	Annually	Arizona Department of Health Services	Vital Statistics; Poisonings Among Arizona Residents Report	Decrease	Percent Change	
Babies Diagnosed with Neonatal Abstinence Syndrome	All	Quantitative: Database; Published Report	Rate per 1,000 babies born	Annually	Arizona Department of Health Services	Vital Statistics; Neonatal Abstinence Syndrome Research Brief	Decrease	Percent Change	
Treatment Admissions Involving Rx Drugs	All	Quantitative: Database	Rate per 100,000 population	Annually	Arizona Department of Health Services	Treatment Episode Data Set (TEDS)	Initial Increase Followed by Decrease	Percent Change	
Final Outcomes: Public Safety									
Drug Narcotic Possession Arrests (Adult & Youth)	All	Quantitative: Published Report	Rate per 100,000 population	Annually	Arizona Department of Public Safety	Crime in Arizona Report	Initial Increase Followed by Decrease	Percent Change	
Drug Narcotic Sales or Manufacturing Arrests (Adult & Youth)	All	Quantitative: Published Report	Rate per 100,000 population	Annually	Arizona Department of Public Safety	Crime in Arizona Report	Initial Increase Followed by Decrease	Percent Change	
Driving Under the Influence of Drug Arrests (Proxy Measure, Includes Rx Drugs+Illicit Drugs)	All	Quantitative: Database	Rate per 100,000 population	Annually	Arizona Department of Public Safety; Analyzed by the Arizona Criminal Justice Commission	Arizona Computerized Criminal History Record System (ACCH)	Initial Increase Followed by Decrease	Percent Change	
Law Enforcement Investigations Involving Rx Drugs (Type and Frequency)	All	Quantitative and Qualitative: Field Reports	Number of Events; Content (Theme) Analysis	Annually	Community; Analyzed by the Arizona Criminal Justice Commission	Law Enforcement Field Reports	Quantitative Data: Initial Increase Followed by Decrease	Quantitative Data: Percent Change	
Final Outcomes: Youth Consequences									
Youth Driving Under the Influence of Rx Drugs	All	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Decrease	Percent Change	
Youth Drunk/High at School (Proxy Correlate Measure, Includes Rx Drugs+Alcohol+Illicit Drugs)	All	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Decrease	Percent Change	
Youth Selling Drugs (Proxy Correlate Measure, Includes Rx Drugs+Illicit Drugs)	All	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Decrease	Percent Change	
Youth Suspended from School (Proxy Correlate Measure, Multiple Reasons Apply)	All	Quantitative: Survey	Percent out of total population	Biennially	Arizona Criminal Justice Commission	Arizona Youth Survey (AYS)	Initial Increase Followed by Decrease	Percent Change	

APPENDIX 3: ARIZONA RX DRUG MISUSE AND ABUSE INITIATIVE DATA SOURCES

12.6 ARIZONA RX DRUG MISUSE AND ABUSE INITIATIVE DATA SOURCES

The Arizona Youth Survey:

This psychometrically valid and reliable survey is conducted biennially on even-numbered calendar years by the Arizona Criminal Justice Commission to more than 50,000 students in 8th, 10th and 12th grades from schools all across Arizona. The survey identifies current youth substance trends and risk and protective factors, as well as correlating consequences and contributing factors in knowledge, attitudes, awareness and behaviors. Data is publicly available at the state and county level, and community-level data is available on request, including by demographic categories. State, county and some coalition-level data is available on the Arizona Criminal Justice Commission's Community Data Project website: <http://www.bach-harrison.com/arizonadataproject/Indicators.aspx>.

The Controlled Substance Prescription Monitoring Program (CSPMP):

This database is a central repository of all Class II-IV controlled substances dispensed in the state of Arizona. Run by the Arizona Board of Pharmacy, the CSPMP tracks the number of prescriptions, pills and dosage, with data provided in aggregate county-level form to local communities who partner with and use strategies from the Arizona Rx Drug Misuse and Abuse Initiative. Additional data include the number of prescribers, pharmacists and law enforcement signed up to use the database and system query data to monitor active use of the system. The Arizona Criminal Justice Commission and the Arizona State Board of Pharmacy co-partner to process the raw PDMP data and provide as available.

The Arizona Department of Health Services, Vital Statistics Data:

Emergency Department Discharges/Non-Fatal Emergency Department Visits, Non-Fatal In-Patient Hospitalizations and Poisoning-Related Mortality data are all tabulated using the Internal Classification of Disease, 9th Revision, Clinical Modification (ICD-9-CM) codes from hospital databases and toxicology reports. These data are typically updated annually, with state and county-level data available via online published reports on the ADHS website: <http://www.azdhs.gov/plan/>. Please also see the ADHS Community Profile website for these and other valuable health indicators: <http://www.azdhs.gov/phs/phstats/profiles/>.

The Arizona Behavioral Risk Factor Surveillance System (BRFSS):

This psychometrically valid and reliable survey is conducted annually by the Arizona Department of Health Services to a randomized sample of Arizona adults aged 18 and over. The purpose of the survey is to monitor general health status, health-related quality of life and well-being and determinants of health and disparities. The questionnaire and data reports can be found on the ADHS website: <http://www.azdhs.gov/phs/phstats/brfs/>.

Neonatal Abstinence Syndrome Research Brief:

This published report provides data on the number of newborns in Arizona with an underlying Internal Classification of Disease, 9th Revision, Clinical Modification (ICD-9-CM) code of "drug withdrawal syndrome in a newborn." These data are updated annually, and the published brief is available on the ADHS website: <http://www.azdhs.gov/phs/phstats/meddir/pdf/neonatal-abstinence-syndrom-research.pdf>.

Treatment Episode Data Set (TEDS):

This database includes characteristics of those individuals admitted to treatment for the abuse of alcohol or drugs by primary and secondary substance of use. The data are submitted by treatment facilities to the Arizona Department of Health Services, Division of Behavioral Health Services. It should be noted that these data are only provided by state licensed/certified facilities and that data are collected at the treatment episode level, rather than the individual level and do not account for individuals receiving treatment services more than one time during the course of the calendar year.

APPENDIX 3: DATA SOURCES

Crime in Arizona Report:

This report is published annually and includes a summary of state crime data (e.g., the relative occurrence of crimes in Arizona, violent crime summary, property crime summary, total arrest summary); data on index crimes committed in Arizona (i.e., murder, rape, robbery, aggravated assault, burglary, larceny-theft, motor vehicle theft, and arson); index crimes and arrests by county; state arrest data (by age group, race and ethnic origin, age, gender, and by juvenile or adult status of the offender); assaults on officers; and bias crimes. Please visit the Department of Public Safety website for available reports: http://www.azdps.gov/About/Reports/Crime_In_Arizona/.

The Rx360 Parent and Community Curriculum Training Survey:

This 12-item survey measures adult attitudes, knowledge, awareness, and beliefs about the risks of Rx drug misuse, proper storage and disposal methods, youth resistance strategies, and parent-child communication. There are pre-test and post-test versions of the survey in order to measure evidence of intended change following the implementation of the curriculum. The instrument is available upon request from the Arizona Criminal Justice Commission or the statewide Rx360 Curriculum approved trainer from Prevention Works.

The Rx Diversion Crimes Training Survey:

This 8-item survey measures law enforcement's attitudes, beliefs and knowledge about the pervasiveness of the Rx drug misuse problem, the role of law enforcement in monitoring the problem, and direct knowledge of Rx drug fraud investigations and charging statutes. There are pre-test and post-test versions of the survey in order to measure evidence of intended change following the implementation of the curriculum. The instrument is available upon request from the Arizona Criminal Justice Commission.

Law Enforcement Field Reports:

These reports are gathered from local police departments, Sheriff's offices and county task forces in order to tabulate the frequency and type of diversion crimes occurring in a particular geographic area. Arizona Computerized Criminal History Record System: Arizona Revised Statute (A.R.S.) §41-1750 requires criminal justice agencies in Arizona to submit arrest and associated case disposition information to the Arizona Computerized Criminal History (ACCH) record system. More specifically, law enforcement agencies are required to submit arrest information for all felony offenses, sexual offenses, driving under the influence (DUI) offenses, and offenses involving domestic violence. The Arizona Department of Public Safety shares ACCH data with the Arizona Criminal Justice Commission's statistical analysis center and much of these data are available by request, with the explicit permission of AZDPS, from the Arizona Criminal Justice Commission.

The Prescriber and Dispenser Rx Drug Misuse Key-Informant

Interview Protocol: This 7-item brief interview protocol asks prescribers to discuss their knowledge, attitudes, awareness, beliefs and behavior regarding their experiences with pain patients, current policies, the Controlled Substance Prescription Drug Monitoring Program and the need for additional resources. The instrument is available upon request from the Arizona Criminal Justice Commission.

The Youth Rx Drug Misuse Attitudes and Beliefs Focus Group

Protocol: This protocol has 4-item protocol uses 15 probe questions to ask middle school and high school youth to discuss their attitudes and beliefs about the risks of Rx drug misuse, parent and peer disapproval of Rx drug misuse, parent-child communication about substance use (with Rx drug specific probes), and stressors and coping mechanisms in their lives that they think are related to youth using Rx drugs. The instrument is available upon request from the Arizona Criminal Justice Commission.