Best Practices for Prescription Drug Monitoring Programs in the Emergency Department Setting: Results of an Expert Panel

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Prescription drug monitoring programs are generally underused in emergency departments (ED) and nationwide enrollment is low among emergency physicians. We aimed to develop consensus recommendations for prescription drug monitoring program policy and design to optimize their functionality and use in the ED. We assembled a technical expert panel with key stakeholders in emergency medicine, public health, and public policy. The panel included academic and community-based emergency physicians, a pediatric fellowship–trained emergency physician, a medical toxicologist, a public health expert, a patient advocate, a legal expert, and two state prescription drug monitoring program administrators. We compiled prescription drug monitoring program policies and characteristics and organized them into domains based on user–prescription drug monitoring program interaction. The panel convened for 3 rounds in which the policies and characteristics were introduced, discussed, and modified in an iterative fashion to achieve consensus. The process yielded policy recommendations and design features, with majority agreement. The panel made 18 policy recommendations within these main themes: enrollment should be mandatory, with an automatic process to mitigate the workload; registration should be open to all prescribers; delegates should have access to prescription drug monitoring program to alleviate work flow burdens; prescription drug monitoring program data should be pushed into hospital electronic health records; prescription drug monitoring program review should be mandatory for patients receiving opioid prescriptions and based on objective criteria; the prescription drug monitoring program content should be standardized and updated in a timely manner; and states should encourage interstate data sharing. An expert panel identified 18 recommendations that can be used by states and policymakers to improve prescription drug monitoring program design to increase use in the ED setting. [Ann Emerg Med. 2016;67:755-764.]

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INTRODUCTION

Background

The United States is currently facing an epidemic of opioid analgesic–related addiction, overdose, and death.[1] Opioid prescriptions quadrupled between 1999 and 2013, with overdose deaths increasing in parallel.[2,3] Painful conditions are the leading chief complaints for emergency department (ED) visits,[4-6] and emergency providers frequently prescribe analgesics,[7] with one recent multicenter study showing that 17% of ED visitors were prescribed an opioid at discharge.[8] A specific challenge to emergency physicians when prescribing is the lack of continuity of care and knowledge about the medical history of the patients under their care. One tool available to assist in clinical decisionmaking is a state-based prescription drug monitoring program.[9] These programs are electronic databases that collect data from pharmacies about dispensed controlled substances.

Importance

Although there is evidence to suggest that prescription drug monitoring programs are a useful tool in reducing opioid-related addiction, diversion, and overdose,[10,11] at present the programs are underused by emergency physicians because of regulatory limitations and program design that are at odds with efficient patient care in the ED.[12,13] The literature supporting prescription drug monitoring program efficacy is based on observational studies,[10,14] with several studies before 2008 demonstrating that prescription drug monitoring program implementation alone is insufficient to affect opioid prescribing and recommend improving program policy and design.[15,16] In their current format, prescription drug monitoring programs have several limitations, such as complex procedures for enrollment, delayed reporting, and stand-alone Web sites that require burdensome log-in procedures. Because each state has developed prescription drug monitoring programs independently, they are not standardized and have not been optimized for best practices.[17] Some of these limitations are more pronounced in the ED setting.[13] For example, accessing the database for patient care can require several minutes, which is problematic for emergency physicians who face the constant tension to

rapidly evaluate and manage patients or risk having potentially ill patients wait untreated. Recently proposed guidelines for improved prescribing in the ED include routine use of the prescription drug monitoring program,[18,19] with the Centers for Disease Control and Prevention, the Food and Drug Administration, and the White House Office of National Drug Control Policy all supporting their expansion.[20]

Goals of This Investigation

To our knowledge, to date there is no policy analysis of the integration of public health, state policy, and emergency medicine for the purpose of prescription drug monitoring program optimization. Although there are several publications recommending best practices for prescription drug monitoring program development and use,[21,22] they have not specifically evaluated state prescription drug monitoring program policy and design in the context of the practice of emergency medicine. The aim of this project was to review the existing recommendations on prescription drug monitoring program design and to convene an expert panel to review current program policy and characteristics to yield design features and policy recommendations that would support best practice in the ED setting.

MATERIALS AND METHODS

Study Design and Setting

We convened a technical expert panel and used nominal group technique to iteratively review prescription drug monitoring program policies and make best practice recommendations for program design and policy in the ED environment. We performed a literature review to identify general prescription drug monitoring program design features and potential best practices, and a policy review to identify detailed program characteristics and policies. The expert panel was convened in 3 rounds of calls and voting, with resultant design features and policy recommendations.

Literature and Policy Review

One author (M.B.G.-E.) performed a systematic literature review to generate the framework for discussion and identification of best practices for prescription drug monitoring program design, and a policy review to identify state policies and regulations of such programs. Targeted search terms (Appendix E1, available online at http://www.annemergmed.com) were used in PubMed after consultation with a medical librarian; a gray literature search was performed with Google, state Web sites, and online data repositories of legislation[23-25] to identify government policies and regulations. M.B.G.-E. reviewed abstracts and full articles for relevancy to the project aim and reviewed legislative databases to identify relevant state policy. The summary of the review was evaluated by 2 content experts (L.S.N. and J.D.S.), and a detailed list of prescription drug monitoring program characteristics and state policies were compiled from relevant publications for review by the expert panel (Appendix E2, available online at http://www.annemergmed.com).

Prescription drug monitoring programs were created out of state policy to solve a public health problem, often without significant input from clinical practitioners. We aimed to incorporate the perspectives of public health, state policy, and emergency medicine in our project and selected 3 core publications from each of these fields as background reading for our expert panel. These were the 2011 White House Office of National Drug Control Policy's prescription drug abuse prevention plan,[20] the assessment of the evidence for best practices[21] from the PDMP Center of Excellence, and the American College of Emergency Physicians' clinical policy on pain management.[26]

Selection of Participants

Between August and September 2014, we assembled the expert panel with key stakeholders in medicine, public health, and public policy to participate in a nominal group technique consensus panel (Table 1). We aimed for a panel composed of content experts and physician stakeholders and sought to fill the following positions: 2 community emergency physicians, an academic emergency physician, a

Table 1. Panelist by title and expertise.

No.	Expert Panel Member	Expertise	Practice Setting
1	Academic physician, facilitator and cochair	Emergency medicine and toxicology	Academic university
2	Academic physician, cochair	Emergency medicine and health policy	Academic university
3	Community physician	Emergency medicine, emergency medicine operations	Community practice
4	Community physician	Emergency medicine, emergency medicine operations	Community practice
5	State PDMP administrator	Public policy	Government
6	State PDMP administrator	Public policy	Government
7	Patient advocate	Patient advocacy	Community and academic
8	PDMP content expert	Public health	Academic university
9	Public health expert	Public health law	Academic university
10	Pediatric emergency medicine–trained physician	Pediatric emergency medicine	Community and academic

PDMP, Prescription drug monitoring program.