Prescribing for Pain: What Medical Students Learn and Where They Learn It

Statement Of Issue/Problem Addressed

In 2018, an estimated 2.9 million people in the United States (12 years and older) reported past month misuse of prescription medication. Prescription drug misuse has contributed to an increased need for substance use disorder (SUD) education amongst medical providers.

Background

The misuse of, and addiction to, opioids is a worsening national crisis that has long term effects on public health as well as social and economic welfare. With the growing incidence of prescription medication misuse, physicians have a significant role in preventing and addressing misuse. However, the parameters of how and when medical students are educated are unclear. The purposes of this study are to understand how medical students are educated on prescription pain management and substance use disorders, assess their confidence in treating patients with pain and substance use disorder, and document their ideas on how to improve education for pain management and substance use disorder.

Methodology

We performed a descriptive study using focus groups with medical students. We recruited one group of 8-10 first- and second-year medical students and one group of 8-10 third- and fourth-year medical students from each of the five partnering medical schools in Philadelphia. Each focus group concluded with a survey about confidence in managing care for patients with SUD. All sessions were audio-recorded, transcribed, with names and other identifiable information removed. Data were analyzed for themes using an inductive content analysis approach.

Results

The following themes were identified from the focus group transcripts: 1) the role of physicians in opioid crisis, 2) the impact of friends/family suffering from SUD, 3) the impact of the current crisis on future medical practice, 4) lack of practical engagement and organized opportunities to learn from non-physician professionals in the current medical school curriculum, and 5) concerns over lack of knowledge about how to care for patients with a co-existing history of drug use/misuse. The confidence rating for how students felt they would manage patient care issues related to the use of prescription opioids and pain treatment given their knowledge at the time was higher among 3rd and 4th year students (with a median score of 4) compared with first and second year students (with a median score of 1.75) when asked to rank confidence on a scale of 0 (not at all confident) to 10 (very confident).

Discussion

Medical students reported concerns about their lack of understanding of effective management of patients who misuse prescription drugs (see Figure 1). A significant disconnect exists between the education provided and the information retained by medical students. This may be because most of the students expressed a desire to learn.

Figure 1. A Sample of Student Quotes from Focus Groups

“I mean you also learn from, not personal experiences, but we probably all know someone or at least I know a few people who have been impacted by this epidemic. ... And it’s really sad but it’s hard not to do research on everything when somebody that you really care about is going through something like this, so yeah that too.”

“I worked as a short-term crisis counselor, and one of the ways that we trained for that was by doing role plays. ... that might be a good way to kind of get our feet wet a little bit or see how those things might present before we see it in reality.”

“I think I would want very specific— from someone who actually works with patients, to hear what the healthcare system is doing wrong and what we should do differently in a very practical way.”

“I think I just want more skills on understanding how to address social complications. ... so how do you address addiction taking that patient’s actual situation into account, rather than knowing the best things to do or the highest efficacy medications...”

“I think the coolest experience that I had was when I was shadowing at a PT clinic and some of the patients themselves were former opioid addicts and they talked about how they got into it, what they did and how they got out. So I think that was probably one of the better conversations that I had, to have like a real patient talk about their experience.”

“You learn in the hospital that you see the person...how they are, their physical appearance, and then it gives you kind of like flags that oh this person might be substance seeking. But we all know that that’s not necessarily true...addiction is something that can affect people on all levels, socioeconomic status.”

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the material in a more practical and engaged manner as opposed to the current sporadic, lecture-based formats. Our recommendations include increasing SUD focused hands-on experiences within medical school curricula to provide real-world examples that better inform future practice.

Conclusion
The increasing attention to the opioid crisis has elevated the problem of prescription drug misuse across the nation. Mandatory and standardized training for medical students, with a more immersive approach, will increase their exposure to SUD and pain management. It may also allay concerns about students’ ability to more adeptly manage care for patients with SUDs in future practice.

Implications For Interprofessional Education
Substance use disorder is a complex issue that requires a multifaceted approach. While physician education is one aspect of addressing this chronic disease, nurses, pharmacists, social workers, behavioral health specialists, and other substance use recovery professionals are also a vital part of an integrative and comprehensive treatment model. To this point, many medical students expressed an interest in learning from non-physician professionals about their work in SUD. It would be noteworthy to gauge the implementation and efficacy of non-physician professionals’ training models and discover where additional barriers to improved outcomes may exist outside of the patient-physician relationship.

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References
4. Five Partnering Medical Schools in Philadelphia: Drexel University College of Medicine, Lewis Katz School of Medicine at Temple University, Perelman School of Medicine – University of Pennsylvania, Philadelphia College of Osteopathic Medicine, Sidney Kimmel Medical College – Thomas Jefferson University.