“Don’t Label Them as Addicts!” Student Pharmacists’ Views on the Stigma Associated with Opioid use Disorder

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Abstract

**Background:** Student pharmacists represent an important potential population for targeted educational interventions focused on skill and confidence development in order to improve interactions with opioid users and to decrease stigma. The objective of this study was to understand student pharmacists’ perceptions of opioid users.

**Methods:** Focus groups were conducted with student pharmacists across Tennessee over two months in 2020. Concepts from the Transtheoretical Mode, Social Cognitive Theory, stigma, and results from a survey sent to student pharmacists were used to develop the open-ended questions. Thematic analysis was conducted to inductively identify main themes. The recruitment of student pharmacists continued until thematic saturation was obtained.

**Results:** Thematic analysis revealed two themes: Don’t label them as addicts, Student Insight into OUD-Associated Stigma and five sub-themes: developing a judgment-free environment; unconscious bias; a possible connection between physical appearance and addiction; sociocultural factors, addiction, and isolation; and motivators to decrease stigma. This study not only presents the pharmacy students’ experiences and their significance, but also reports their recommendations for addressing the stigma associated with OUD in the pharmacy curriculum.

**Conclusions:** These findings highlight the need to normalize appropriate language when describing patients with OUD and avoid negative labels such as “addict.” The findings also indicate where the roots of stigma lie and provide some of the tools to fight stigma on different fronts. Future research should explore and address potential implicit biases throughout pharmacy curriculum.

**Keywords:** student pharmacist perceptions, opioid stigma, opioid use disorder, addiction

Introduction

In recent decades, the United States has experienced an opioid epidemic resulting in an alarming death rate due to opioid overdose. The opioid epidemic has been even more critical in Tennessee, which has witnessed one of the highest numbers of opioid prescriptions provided and drug overdose deaths directly associated with prescription opioids, heroin, and illicit fentanyl-containing derivatives. A recent Tennessee Department of Health report presented an alarming rate of 19.3 deaths per 100,000 persons in 2018. Pharmacists are well positioned to positively impact the opioid epidemic given their widespread accessibility to communities.

The American Association of Colleges of Pharmacy (AACP) Bylaws and Policy Development Committee highly encourages colleges of pharmacy to prepare students with the knowledge and skills needed to help patients and their families and caregivers with pain management and the prevention and treatment of substance use disorders. However, complexity exists in delivering this content due to its overlap with clinical therapeutics, psychosocial and behavioral components, and stigma. Firmly held beliefs by learners, patients, and cultural norms at training sites may serve as barriers to achieving downstream outcomes like improved quality of patient care, which traditional training alone may be insufficient to impact. A recent study that assessed third-year student pharmacists’ verbal and nonverbal communication skills during a simulated opioid counseling session found that many students lacked confidence in educating patients about opioid-specific risks, such as dependence, addiction, or overdose. These students further reported the need for additional education and resources on communicating with patients about this sensitive topic. Other studies have also reported on this gap in knowledge.

It is important to both meet the need for greater clinical knowledge and confidence in communicating with and treating OUD patients, and also understand students’ own attitudes and beliefs towards patients of this vulnerable population. OUD-related stigma exists among professional students, and such perceptions may impact students’ receptiveness to OUD-related education and training, ultimately impacting the quality of healthcare provided. Pharmacy education may be used to address stigmatizing views held by student pharmacists. A pre-
require to this is the uncovering and exploration of students’ views and behaviors regarding stigma. Eliciting students’ attitudes towards OUD will help educators develop and tailor training programs to address the complex needs of both the learner and the practice environment. For example, a recent study investigating stigma-related barriers to naloxone recommendations by student pharmacists found that although stigma was seen among students, it was also perceived to be present amongst patients as well – limiting the patients’ willingness to receive a naloxone recommendation.10

Although work has been done to reduce OUD stigma, research suggests that educators may still have an incomplete picture of health professional students and stigma, and therefore strategies by which to overcome it. For example, one U.S. college of nursing implemented an interactive presentation on OUD.9 Pre- and post-presentation survey results indicated that stigma and bias remained present among students; although, improvement was seen before and after intervention.9 Other institutions have reported positive change in student attitudes and decreased stigma following implementation of various educational interventions centered around OUD, including interprofessional workshops, panel discussions, and didactic presentations.6, 7 Educational interventions, such as these, may close the OUD knowledge gap and improve the attitudes and beliefs of future healthcare providers.6, 9

OUD-related stigma plays a significant role in the lives of individuals suffering from this disease and continues to be a major issue for these individuals. Stigma is defined as an internally perceived negative belief that a stereotype about a specific group exists.11 This can be a belief that people hold of themselves (known as self-stigma) or a belief held towards a specific person or group (i.e., public stigma).12 Stigma plays an important role in OUD because it can lead to internal shame, fear, discrimination, and social isolation of those affected and may deter patients from pursuing necessary prevention and treatment services.11, 13 Given the emergence of OUD as a disease and the stigma associated not only with taking opioid prescriptions, but also seeking treatment, it is critical to collect solid evidence for finding effective resources that can buffer the negative impacts of stigma when student pharmacists interact with patients suffering from OUD. The literature reveals a gap in OUD-associated stigma and the role played by student pharmacists in destigmatizing behavior.

To best design an educational intervention to address the complexities of care for patients with OUD, more work is needed to understand the unique perspectives of students. This study aims to explore student pharmacist perceptions of opioid prescribing, use, and misuse, and management of the associated stigma.

Methods
This study used focus group methodology to facilitate group-thinking and brainstorming of student pharmacists’ opinions regarding opioid prescribing and stigma associated with OUD.14 To our knowledge, there is no theoretical framework that comprises all these foci. The semi-structured focus group interview guide was designed using concept elements from the Transtheoretical Model proposed by Prochaska, stigma proposed Link and Phelan, and Social Cognitive Theory (SCT) proposed by Bandura.15-17 For example, the SCT16 and Transtheoretical Model17 informed the focus group guide to better capture the continual interaction between cognitive, behavioral, and work related factors. The concepts of stigma were utilized to pose further questions explicitly related to stigma.15 Furthermore, these theories support the grouping of concepts and operationalizing of definitions.18 The interview guide was tailored to address student pharmacists’ specific needs related to interacting with patients with OUD and learning behaviors that decrease its associated stigma.

Participants and Procedures
The study was approved by the University of Tennessee Health Science Center (UTHSC) Institutional Review Board. The participants, who were all student pharmacists enrolled at UTHSC, were identified at the conclusion of a survey that asked if they would like to take part in a focus group study. To enhance the potential for producing richer data and obtain a collective opinion about the research question, focus groups were utilized.14

The first and last authors (AC, KH) led all focus groups, and both have past training and experience with qualitative data collection. Both are pharmacists by training and served as faculty at UTHSC at the time this study was conducted. Four of the authors (KF, KH, EH, MV) obtained Post Graduate Year-1 residency training, while one author is a qualitative researcher (AC) who received a PhD in Social Administrative Pharmacy. In addition, AC has expertise in stigma-related research. Two authors (MV, EH) have expertise in education and quantitative data analysis; MV practices as a clinical pharmacist who provides infectious disease care for hospitalized patients, including those with OUD-related inpatient infections. EH is also a clinical pharmacist and her expertise in education focuses mainly on assessment. MV and EH provided guidance in reviewing the focus group questions.

Focus groups were conducted in-person and through Zoom, which enabled students from all three campuses to attend. A semi-structured focus group strategy was used to welcome the students to discuss their experiences with individuals suffering from OUD and methods for addressing some of the stigmatizing behaviors.14 The semi-structured strategy allowed the researchers to pose largely the same questions; however, the later focus groups incorporated additional questions, which were raised by earlier discussions. This strategy to incorporate additional questions leads directly to an enhancement of the
external validity of the study findings. The questions were divided into four topics (Appendix 1).

The first and last authors obtained verbal informed consent before the focus groups started. All focus groups were digitally recorded, and a professional transcriptionist transcribed them. The three focus groups lasted 59 minutes, 52 minutes, and 58 minutes, respectively. The participants received boxed lunches as an incentive for their time. Both facilitators took field notes during data collection to note non-verbal expressions and interactions that were used in writing memos in the data analysis process.

Data Analysis and Establishing Rigor in Qualitative Data
The focus groups transcripts were analyzed using thematic analysis that followed the six-step process as outlined by Braun and Clarke. The following steps were used: familiarization with the corpus of data, coding inductively the entire dataset, identifying emerging themes, reviewing themes with the research team, defining and naming the themes, and writing the analysis. The analysis team continued recruiting until thematic saturation was achieved at which no new themes emerged with subsequent focus groups. All focus groups transcripts were uploaded into qualitative analysis software (Dedoose®, California, US), which was used for generating initial codes and developing and reviewing themes.

Lincoln and Guba’s criteria for demonstrating the quality of qualitative research were met. Auditability was maintained by documenting all memos relevant to interpretations and decisions regarding thematic analysis during data analysis. This process was facilitated by using Dedoose software. Furthermore, to ensure that rigor was maintained throughout the data collection and analysis, the research team also followed Braun and Clarke’s 15-point guidelines on conducting thematic analysis. Confirmability was addressed by using a three-member research team during the data analysis process. The first and last author (AC, KH) coded the transcripts inductively and reached consensus on the codes and the reflective memos. Then, the team met several times (AC, KH, KF) to discuss the codes, categories, themes, and memos, and consensus was achieved. The rationale for reviewing all the extracted data by all researchers was to prevent researcher bias and selective inattention and to assist in identifying rich quotes from the transcripts. Transferability was addressed by providing “rich” descriptions that resonate with the context. Credibility was addressed throughout all the stages of data collection and data analysis. In these trustworthiness steps, the codes, categories, themes, along with the field notes were revised, with the objective to identify the most important, "rich" or "revealing" quotations that were relevant to the research question. The team (AC, KH, KF) reflected on the reflective written memos that enabled us to better understand the data. In the final stage, all authors agreed on the representative quotations that would be used to ensure no overlap or shared meaning. Each theme and sub-theme are evidenced by “rich” quotations obtained from the participants’ transcripts. Furthermore, the consolidated criteria for reporting qualitative research (COREQ) was consulted throughout data collection, analysis, and interpretation.

Results
Three focus groups were conducted over two months in 2020, given the COVID-19 circumstances. The focus groups were conducted at all three campuses of the UTHSC College of Pharmacy: Nashville, Knoxville, and Memphis. Sixteen students participated, and they identified themselves as second-, third-, and fourth-year student pharmacists.

Two overarching themes emerged from participants’ opinions about and experiences with patients on opioid prescriptions and the stigma associated with OUD. The first theme, “Don’t label them as addicts,” reveals the students’ views of persons suffering from OUD. The second theme presents the students’ perspectives on the possible causes of stigma associated with OUD. Within each of these two major themes, there were sub-themes that reveal the similarities and differences between each theme. The overarching themes and sub-themes are presented below, with quotations to illustrate findings.

Theme 1: Don’t label them as addicts
In this theme, student pharmacists presented their opinion about individuals suffering from OUD, which conveys a strong message to the audience: “Don’t label them as addicts.” Labeling these individuals as addicts is an obvious negative sign to the patient and to others that portrays what is frequently considered a shameful illness. On the contrary, many student pharmacists noted their view of interactions with people suffering from OUD as being normal relationships.

“I don’t perceive them as addicts, first off. I perceive them as people who ended up being a part of the chosen few in terms of they started taking the medication for some reasonable indication, and they just ended up being one of the few to be addicted to the medication. And I just perceive them as people that need help that are somewhat crippled to the addiction, and they need our help.” (PD2, Female)

For another participant, the people suffering from OUD with whom she interacts frequently at the pharmacy where she works are perceived as any other patient and she does not label them as something out of the ordinary. She stated:

“I just perceive them as people with a disease that need to be treated like anybody else.” (PD3, Female)

Individuals suffering from OUD are recurrently categorized as addicts, which is a term that seems to be disturbing/sinister. The terminology used frequently in our society may also point to a perception of judgment on the condition. Another participant presented why he believes these individuals should
not be categorized as addicts when compared to other individuals who have other disease states.

“I just think they're a patient that needs help with getting off the medication that has an addictive quality. So, I don't have any negative perceptions of them, I just think of them as a patient just like any patient has any other illness like diabetes, infection, or whatever it is.” (PD4, Male)

As seen above, these student pharmacists reinforced the concept that individuals suffering from OUD need help from the healthcare team to fight the disease. Furthermore, other student pharmacists echoed the same perceptions, also noting that finding help might also mean emotional help.

Sub-Theme: Developing a judgment-free environment
Several student pharmacists mentioned the need for the healthcare system and society to develop a “judgment-free environment.” One participant feels a connection between counseling and the use of emotions to show empathy towards individuals suffering from OUD. This judgment-free environment could contribute to a more comfortable and trustful relationship in pharmacy practice.

“I think one thing that kind of goes along with the empathy that we've spoken about and creating a judgment-free environment is also being motivational with patients who have addiction or are just prescribed opioids. It makes me feel better at my job, and the patients are happier to see me the next time and more open to feedback if there are any changes that need to be made. So, kind of like a positive attitude and an approach to the counseling sessions that's more like motivational interviewing. That seems to go a long way.” (PD3, Male)

The below extract suggests ways that student pharmacists are incorporating and applying classroom learned skills to these patient encounters. For example, one student pointed out the use of motivational interviewing. Several student pharmacists suggested the need for incorporating the tools learned in various classes to ensure counseling is conveyed appropriately to individuals suffering from OUD.

“From a didactic standpoint, I think we do a great job at learning how to motivationally interview people...But I think it’s very important that as [future] pharmacists, we learn how to deal with these situations because we will have to face them in the real world.” (PD2, Male)

Theme 2: Student Insight into OUD-Associated Stigma
Most of the student pharmacists in this study discussed several potential causes for the negative stigma associated with OUD. This theme also presents students’ views in finding ways to fight the stigma associated with OUD. This theme is broken down into four sub-themes:

i. Sub-theme: Unconscious bias
Most of the participants discussed their pre-pharmacy notions of patients suffering from OUD. Several participants commented on the elements that contributed to these opinions. All participants pointed out that after starting the pharmacy program their views changed because of the exposure to a variety of lectures that helped them understand the anatomical and physiological mechanisms of addiction. As one participant stated:

“I would say my perception throughout my time in pharmacy school has changed. I would say at the beginning, I would have probably been more like standoffish, not as receptive, more of like, it’s their fault kind of perception. But then as I’ve worked through community pharmacy and having a little closer view of these kind of patients, you do realize that it’s not that simple.” (PD4, Female)

Another participant discussed his attitude toward individuals suffering from OUD changing and normalizing over time; he no longer holds judgmental feelings.

“I would say that my original perspective was very judgmental, and it came across as like, oh, I don’t know how to like help these people. It’s almost like they were helpless, but as I’m going through more pharmacy classes, more experiences throughout my job and throughout a few service events, I think that it’s been very helpful to kind of change my perspective in a sense of, oh, these people are just like me.” (PD2, Male)

ii. Sub-theme: A possible connection between physical appearance and addiction
A number of participants pointed out the possible link between physical appearance and personal sense of being well. For example, one participant relayed that there might be a connection between the physical appearance of certain individuals and their behavior of opioid addiction.

“Yeah, so like just the way they're- I don't know how to explain that, the way they're dressed sometimes, like the smell sometimes of the patient when they approach you. It's just not proper, I guess. I'm not sure how to describe it, but it's sometimes like raising their voices...” (PD2, Male/Female)

iii. Sub-theme: Socio-cultural factors, addiction, and isolation
Discussion about the roots of stigma associated with OUD pinpointed a few plausible causes identified by students. Students perceived a lower standard of care being provided to patients with possible OUD due to their physical appearance and behavior in the pharmacy. Moreover, there is an acknowledgement of the complex interaction between a patient’s homelife, social support, mental and physical health, and opioid use. One participant acknowledged that the cultural environment in the U.S. represents the main contributor to stigma associated with OUD. Her phrase “it's just kind of embedded in U.S. culturally” gives a sense of the issue.
“One of the common barriers along with the stigma that I feel process: medications during the medication dispensing workflow patient counseling and communication as is placed on policing roots of stigma as a lack of the same effort and care placed on Similarly, another participant describes her opinion on the (PD4, Female) on, not just for addiction, but, yeah, definitely stigma for sure.” (PD2, Male)

The next quotation reinforces the previous thought and points out the need to involve the community as well.

“The other way that we could destigmatize is, like she said, just having those one-on-one conversations with patients. But I think it’s also important that we involve community and helping the community understand and destigmatize that. So, I think community involvement is something that we need to focus on.” (PD2, Male)

Similarly, another participant describes her opinion on the roots of stigma as a lack of the same effort and care placed on policing medications during the medication dispensing workflow process:

“One of the common barriers along with the stigma that I feel the group has already identified is time... because often times, we’ll spend ten or fifteen minutes just looking through [medication profiles], but once we reason it’s a patient who truly needs the medication, we just check them out at the register, send them on their way, and the reality of it is we’re not thoroughly counseling, and I feel like that’s a barrier.” (PD2, Female)

Another participant outlined a very pragmatic interpretation of the possible causes of the OUD stigma. She believes that the lack of emotional support could be the cause that leads an individual to suffer from OUD.

“...but I’ve noticed it’s people without good family support sometimes because if you have a good family support around you, a lot of times, they’re paying attention to what you’re taking and how you’re acting, and they might say something or help you seek help sooner if they think it might be a problem, whereas if you’re alone, you may not have people like watching your back to make sure like, oh, you already took that.” (PD3, Female)

iv. Sub-theme: Motivators to decrease stigma
Student pharmacists perceive stigma as a detrimental contributor to a trustful relationship between themselves and the individuals, something they clearly wish to avoid. The students offered various was to decrease stigma, one of which is to have an open conversation with individuals about the opioid medications they take. This provides an opportunity for future pharmacists to engage individuals in conversation about the possible ways to decrease the amount of that medication taken.

One participant expresses her opinion on the need to initiate that discussion with an individual:

“One way to prevent it or just to destigmatize it is obviously to involve this more into conversation, talk about this, normalize this and tell them that it’s okay.” (PD3, Female)

Participants in this study also discussed various viable options in the form of communication or perceptions that could help them to combat the stigma associated with OUD. This is a
finding that is consonant with existing literature that showed the benefits of using different strategies to fight the stigma associated with OUD. Donohoe et al.28 and Maguire et al.29 demonstrated the benefit and value of active learning activities within the Pharm.D. curriculum to prepare student-pharmacists for their role in managing the opioid crisis and harm reduction. These activities included opioid overdose and naloxone training through lecture content, mock counseling, practice with training kit devices, case-based discussion, and dosing conversions.28, 29

Our findings show the importance of addressing individual needs and treating an individual with OUD as any other patient with any other disease state. This is consistent with the literature that supports the use of a patient panel experience with OUD patients in shaping interprofessional students’ perceptions of individuals with OUD.7 At the panel patients shared their personal stories and experiences with addiction, treatment, and recovery.7 Interacting with real life OUD patients generated more humanistic perspectives and less bias and stigmatizing attitudes among these future healthcare professionals.7 Similar activities can be integrated into Pharm.D. curricula in the U.S. to meet this need to eradicate stigma and better prepare student pharmacists to serve as positive, patient-centered, empathetic healthcare leaders.

Not labeling individuals with addiction is a critical element and a novel finding specifically in the pharmacy curriculum literature. This pattern is elaborated in the current findings, where we can see why student pharmacists think it is essential to have a normal relationship with individuals suffering from OUD. For example, categorizing the individuals as “addicts” would act as a barrier, while treating them equally can work as benefactor. The existing literature suggests an increased stigma towards OUD patients among health professionals and contributes to lower health care.24 The specific language used by patients, providers, and the general public is an important factor in misunderstanding OUD and the spread of stigma.30

Recommendations for future research
While this present study has identified specific areas within pharmacy curricula that could be addressed through examples embedded within didactic and advanced pharmacy practice experiences, future research is still needed to better understand the needs of student pharmacists with respect to the pharmacists’ response to the opioid epidemic. Specifically, additional studies could address key structural changes in pharmacy curricula to assist in better understanding or addressing implicit biases in community pharmacy. Future multi-school studies evaluating how different colleges of pharmacy address OUD-related stigma would provide a more robust framework to address this problem.

Limitations
The sample was predominantly made up of second-, third-, and fourth-year students at a single college of pharmacy, and therefore could have been improved by the addition of a few first-year students or other geographically distinct colleges of pharmacy. However, our results are likely to be similar to other student pharmacists in colleges of pharmacy located in similar geographic regions (i.e., southeast United States) given the incidence of OUD in these areas.

Conclusions
This manuscript presents findings from a thematical analysis of student pharmacists’ opinions on the stigma associated with OUD. The study provides detailed evidence of their experience interacting with individuals who suffer from OUD and the need to avoid labeling individuals as “addicts.” The findings also have shown where the roots of stigma lie, and it provides some of the tools to fight the stigma on different fronts. The findings may be useful from a pharmacy curricular perspective in better educating student pharmacists about unconscious biases and methods to address them to improve patient care. Ultimately, these data can be useful in providing insight into normalizing discussions with patients impacted by OUD in community pharmacy settings.

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### Appendix 1: Concepts Addressed During Focus Groups and Sample Questions

| Concept addressed | Sample questions                                                                                                                                                                                                                                                                                                                                 |
|-------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Stigma            | Think of a time when you had an interaction with a patient who was known to the pharmacy for filling opioid prescriptions. How was your interaction with him/her? What was your experience and comfort level with this type of patient interaction/education?  <br>  In your opinion, what attitudes and behaviors would make you most successful in interacting with patients in this setting? <br>  How do pharmacy students perceive patients diagnosed with addiction and people in the community? <br>  If you had a minute to give your recommendation for how pharmacy students could become more involved in decreasing the stigma associated with opioid use disorder, what would that be? We will go around the table and allow each of you to respond. |
| Attitudes and Behavior | In your opinion, what are the main barriers for patients who come to the pharmacy to pick up opioid prescriptions?  <br>  In your opinion, what attitudes and behaviors would make you most successful in interacting with patients in this setting?                                                                                      |
| Counseling        | What are some ways you think patients benefit the most from having access to a pharmacist?  <br>  In your opinion, what are some counseling points that a pharmacy student is expected to provide to a patient on opioid medications?                                                                                           |