

## How Pharmacy Students Feel about an HIV Pre-Exposure Prophylaxis Advertising Campaign

Kenric B. Ware, PharmD

Mercer University, College of Pharmacy

### Abstract:

*Description:* This activity prompted pharmacy students to analyze a Los Angeles Lesbian, Gay, Bisexual, and Transgender (LA LGBT) Center-generated “F\*\*k w/out fear” HIV pre-exposure prophylaxis (PrEP) billboard campaign. Students shared their thoughts after viewing the billboard (initial reactions); if the billboard was offensive (Yes/No); if the billboard effectively raises awareness about sexually transmitted infection (STI) prevention (Yes/No); and if they believed pharmacy school is an appropriate place to discuss this topic (Yes/No). Students also provided open-ended responses directed to the campaign’s developer(s). Students received points toward their grades for participation. *Key Findings:* Sixty-one of 62 pharmacy students responded to the HIV PrEP billboard-related questions (98%). Approximately one-fourth of the students identified as male (27%), with less than half not earning a Bachelor’s degree (44%) nor having pharmacy experience (41%) prior to pharmacy school. Students’ mean and median ages were 28 and 25 years old, respectively. “Age” as an independent variable statistically significantly predicted whether students felt the billboard effectively raises awareness of STI prevention; the older the students, the greater the belief in its effectiveness. No variables statistically significantly predicted if students took offense to the billboard’s message. *Conclusions:* Pharmacy students held varying views toward the “F\*\*k w/out fear” HIV PrEP billboard campaign and disparate beliefs in its ability to help curb STIs. Students gave feedback that explained their stances and unanimously agreed that this topic is appropriate for pharmacy school. Pharmacy programs can implement similar methods to gauge their students’ analyses of unorthodox approaches to public health dilemmas.

**Keywords:** LGBT, HIV PrEP, sexually transmitted infections, pharmacy students

### Description of the Problem

Human immunodeficiency virus (HIV) pre-exposure prophylaxis (PrEP) is an HIV prevention technique that benefits from publicity about its effectiveness.<sup>1,2</sup> Word of mouth can play a role in bolstering HIV PrEP uptake.<sup>3</sup> Publication outlets may not accurately depict HIV, which could hamper HIV PrEP’s necessity.<sup>4</sup> Along with HIV prevention campaigns, some researchers found that people are interested in learning about condom accessibility and utility.<sup>2</sup> Other researchers have tried to link frequency of exposure to HIV prevention materials with willingness to discuss HIV prevention with sex partners.<sup>1</sup> Furthermore, emotionally charged HIV prevention announcements can influence whether people choose to learn their own HIV status.<sup>5</sup>

Doctor of pharmacy programs are encouraged to facilitate activities that equip their students to interact with community-based initiatives.<sup>6</sup> Pharmacy students may aspire to assume occupations that help reduce HIV acquisitions.<sup>7</sup> Pharmacy students could also participate in HIV prevention marketing campaigns, perhaps contributing in a comical but constructive way to reach their audiences.<sup>8,9</sup> Therefore, pharmacy education should welcome opportunities to challenge its students’ viewpoints to prepare them for an evolving healthcare landscape.

### Corresponding Author:

Kenric B. Ware, PharmD

Mercer University, College of Pharmacy

Atlanta, GA

[Ware\\_kb@mercer.edu](mailto:Ware_kb@mercer.edu)

Recently, the Los Angeles Lesbian, Gay, Bisexual, Transgender (LA LGBT) Center introduced its “F\*\*k w/out Fear” campaign to raise awareness about HIV PrEP.<sup>10</sup> The “F\*\*k w/out Fear” campaign encompasses billboard, paper-based, and digital advertisements visible throughout Los Angeles, California communities. Arrangement and dissemination of these promotional materials throughout the communities appear to be at the discretion of the LA LGBT center, with details of where the billboards are placed or where and how often the paper-based and digital campaigns are circulated not being readily apparent. The billboards feature the mantra “F\*\*k w/out Fear” to the left-hand side of their displays, with the phrase “PrEPhere” in the center, followed by the name of the sponsoring organization, “Los Angeles LGBT Center,” on the right-hand side. These series of images sit atop a statement that says “One PrEP pill a day can prevent HIV.” Beneath this announcement, the lower left-hand portion reads “Prevent STDs with a condom,” incorporating an image of an external (male) condom between “STDs” and “with,” and the lower right-hand component contains the website “PrEPhere.org.”

All of the billboard’s lettering is capitalized, projected in black, white, or blue colors. The font size decreases in relation to where the content is on the billboard; the “Prevent STDs with a condom” and “PrEPhere.org” messages are noticeably smaller than the remaining content. The paper-based and digital content closely reflects what is on the billboard, with some versions omitting the “Prevent STDs with a condom” statement. A complementary slogan to “F\*\*k w/out Fear” is “Fearless F\*\*ker,” an expression placed on T-shirts without any other content and distributed by the LA LGBT center.

Unfortunately, communities impacted by HIV and others are unlikely to know that HIV PrEP exists.<sup>10</sup> The LA LGBT Center asserts that “F\*\*k w/out Fear” promotes HIV PrEP and STI prevention in an authentic and productive way.<sup>10</sup> Pharmacy students less familiar with this arena may have a different outlook.

### Statement of the Innovation

The purpose of this activity was to show pharmacy students the LA LGBT Center’s “F\*\*k w/out fear” campaign to see if it resonated with them. A primary aim was to observe students’ reactions to the billboard and to learn whether it offended them. A secondary aim was to explore if pharmacy students believed that the campaign effectively raises awareness about STI prevention. A tertiary aim was to find out if students felt pharmacy school is an appropriate place to discuss this topic. A concluding ask of the students was to provide feedback on the “F\*\*k w/out fear” campaign as if they were speaking directly to its designers.

In quarter three of a nine-quarter didactic curriculum, within a three-year program, pharmacy students received five lectures discussing aspects of STIs in a Microbiology/Immunology course. Each lecture lasted 65 minutes over ten weeks. The activity described here occurred towards the end of the course and asked students to answer: 1. What two words/phrases came to mind when you saw this image? 2. Does this image offend you? 3. Do you think this image effectively raises awareness about preventing STIs? 4. Do you think pharmacy school is a good place to discuss this type of sexual health communication strategy? 5. If you could give feedback to the content creator(s), what would you say? Questions number one and five were open-ended while questions two, three, and four invited “Yes” or “No” responses. The assignment stipulated rationales to accompany replies to questions two through four. Responses to each question equated to 1.2% of the six percent grade allotment.

The statistical design used multivariate logistic regression to analyze predictability of the dependent variable groups, “Yes” or “No,” by categorical and continuous independent variables, namely student demographics obtained from a different class assignment. The continuous variable included age, in years. The categorical variables included gender (female or male); ethnicity (Hispanic or Non-Hispanic); highest level of education completed (Associate degree, Bachelor degree, Doctoral degree, Master degree, No degree – completion of pharmacy prerequisites only); pharmacy experience before pharmacy school (Yes or No) and relationship status (in a relationship but not married, married, single). Gender and ethnicity variables were selected to provide a description of the sample’s composition. Highest level of education completed and pharmacy experience before pharmacy school variables were selected to explore if the extent of education or pharmacy experience corresponded to more or less favorable campaign

perceptions. The relationship status variable was selected because students who reported being married or in a relationship but not married may have viewed themselves as further removed from the billboard’s contents than their counterparts who reported being single.

All data analyses were performed using the Statistical Package for Social Scientists (SPSS), Version 28, with statistical significance defined as a p-value < 0.05. The author’s Institutional Review Board approved this study.

At the beginning of the class, the author explained the assignment prior to displaying the “F\*\*k w/out fear” campaign image on the lecture room’s monitors. He also provided written instructions. This was an individual assignment without a word limit restriction, with the deadline set for the end of class. The author solely reviewed all submissions.

### Critical Analysis

Sixty-one of the 62 students enrolled in the course (98%) submitted their assignments through the online course portal by the deadline. One student did not complete the assignment. Of these 61 students, two students did not comply with all of the instructions when completing the assignment (N = 59). Seventy three percent of students identified as male. Non-Hispanic students predominated the sample, amounting to 85% participation. The majority of the sample obtained a Bachelor’s degree before pharmacy school (56%) and attested to having pharmacy experience prior to enrollment (59%). The mean and median ages, in years, were 28 and 25, respectively.

Table 1 lists students’ reactions to the billboard gleaned from their assignment submissions in descending order of frequency. While some students agreed with the message, they did not find it amusing. Alternatively, there were students that reportedly giggled at the message, but stopped short of offering their support. Certain students were leery of the message, believing it is too good to be true. Other students mentioned being appalled at the message’s public display.

Eight of 59 students (14%) stated they were offended by the billboard’s image. Thirty-three of 55 students (60%) believed that the billboard’s image effectively raises awareness about preventing sexually transmitted infections (STIs). Four students provided answers to this question such as “maybe” or “yes and no” that were excluded from the analysis. All students (100%) in this sample reported that pharmacy school is a good place to discuss advantages and disadvantages of this type of sexual health communication strategy.

Statistical analysis was not performed on “Do you think pharmacy school is a good place to discuss advantages and disadvantages of this type of sexual health communication strategy?” because all students replied “Yes.” No independent variable statistically significantly predicted if the billboard was

offensive or not ( $p > 0.05$ ). Age, in years, statistically significantly predicted views that the billboard effectively raises awareness about STI prevention ( $p = 0.042$ , 95% CI (1.005, 1.298)). This finding indicated that as students' ages increased, the greater their belief that the billboard effectively raises awareness about STI prevention.

Students presented varying reasons for taking or not taking offense to the billboard. Offended students noted that the language conflicted with their religious beliefs and that it provides a license to have irresponsible sex. Another criticism was the billboard only focused on HIV and refrained from naming other STIs. Conversely, unoffended students commended its frankness and its ability to confront HIV stigma in a humorous way. Other unoffended students felt detached from the message, citing the rationale of identifying as heterosexual and confused why people would trust a pill to prevent HIV acquisition.

Whether students felt offended by the message was not entirely indicative of how they viewed its effectiveness. There were instances where those offended conceded that the message served its purpose. There were examples where others not offended believed that the message fell short. Some students questioned the message's value feeling that the "vulgarity" detracted from its purpose. Students less convinced of its utility also charged the message with distorting PrEP's capabilities, quoting abstinence as the only sure way to prevent HIV. Counterpoints to the ineffectiveness claims contended that the message works well because it will resonate with youth and that replacing "F\*\*k" with a word like "sex" would sterilize the intended impact.

Irrespective of how the message landed or if there was belief in its benefit, every student endorsed pharmacy school as an ideal place to have this discussion. Rationales included equipping students to interact empathetically in healthcare settings, with other references made to pharmacists currently having a similar responsibility to counsel on contraceptive methods. However, some students questioned the relevancy of this topic to all pharmacy practice arenas and asserted that pharmacies may regard "F\*\*k w/o fear" materials as too unprofessional to house in their locations. An additional comment supported pharmacy schools hosting this conversation, but cautioned against venturing too far into "sex education topics."

When asked for feedback directed to the "F\*\*k w/o fear" content creators, students offered thoughtful insights. One critique was the condom image on the billboard should be larger to amplify its importance. Another suggestion was to incorporate a telephone number alongside the website for greater access to the organization. Students also gave competing observations about the "LGBT" depiction within the billboard; some students saw this as empowering LGBT communities and appreciated the gesture while other students

interpreted it as singling out LGBT communities, inherently giving a pass to heterosexual communities.

As the age of the student cohort increased, there was a proportional increased belief that the billboard effectively raises awareness about STI prevention. Considering older pharmacy students are likely to have encountered more real-world complexities than their younger counterparts, this finding may reflect understanding levels of the campaign's desired effect growing with age. Notably, although not statistically significant, the older the cohort, the more they found the billboard offensive. This occurrence likely underscores the content creator prioritizing impact over impressions. Community-based organizations stand to benefit from pharmacy students' perspectives about their medication-centered awareness initiatives. Pharmacy faculty members are encouraged to identify controversial scenarios involving drug therapy administration and explore their pharmacy students' viewpoints.

A study in Kenya analyzed fear-based campaigns for HIV prevention that simultaneously contained advice to overcome the fright of contracting HIV.<sup>2</sup> Participants in the Kenyan study viewed themselves at high risk of acquiring HIV or believed that they were already living with HIV.<sup>2</sup> In contrast, the pharmacy students here seemed removed from contracting HIV. While the Kenyan account accentuated condoms as central to preventing HIV acquisition, the "F\*\*k w/out fear" campaign incorporated condom use as a billboard footer depicted in inconspicuous font. A parallel that existed between the Kenyan study respondents and the pharmacy students described here is both groups' dissatisfaction with the amount of information included in the respective awareness campaigns. A shared concern was that although the advertisements contain emotional appeals, their content does not equip observers with the knowledge that they need to make the best sexual health choices.

A recent United States study assessed the impact of hope, fear, and non-emotional HIV public service announcements (PSAs) on viewers' attitudes toward HIV.<sup>5</sup> When analyzed by gender, men observing hopeful HIV PSAs expressed more stigmatizing feelings toward HIV than men observing fear and non-emotional HIV PSAs.<sup>5</sup> This finding suggests that HIV awareness material can generate different responses from people viewing the same content. Pharmacy students here regarded the "F\*\*k w/out fear" HIV PrEP billboard campaign as both stigmatizing and liberating for LGBT communities, similar to how the HIV PSAs in the United States-based survey evoked feelings of compassion and condemnation from survey respondents. Furthermore, both the United States-based survey participants and the pharmacy students here questioned directly and indirectly why people now living with HIV did not do more to protect themselves from acquisition.

There were limitations to this activity. The author announced at the beginning of the class that he was unaffiliated with the campaign. However, some students were possibly not as candid in their campaign assessments, skeptical of the author's proximity to it. Additionally, the question probing whether this topic is appropriate for pharmacy school associated the "F\*\*k w/o fear" campaign with being a "sexual health communication strategy." This reference could have biased students by using a positive connotation to describe it.

Students engaged in this activity prior to HIV PrEP's formal introduction in the curriculum. In turn, some students had previously heard of HIV PrEP while others had not. While this difference possibly influenced opinions about the campaign, students' varying familiarities with HIV PrEP likely mirrors those outside of the educational community.

### Next Steps

Offering students points toward their course grades for feedback on the "F\*\*k w/out fear" display was a worthwhile exchange. The pharmacy students constructively relayed their vantage points, producing insights that are likely valuable to the campaign designer. As a result, there is a plan to consolidate the student feedback into a one-to-two page correspondence and communicate it to the sponsoring organization. An additional aim is to develop inter-professional education opportunities that bring pharmacy and marketing students together at similar points in their academic training. A goal would be to foster sharing of ideas related to designing medication-specific promotional activities.

This classroom activity asked pharmacy students to comment on a "F\*\*k w/out fear" HIV PrEP billboard display. Although these pharmacy students had experience giving feedback on respective instructor and course evaluations, this assignment compelled them to assess a community-based initiative. While students' input differed, their perspectives presumably reflect those of the general population. These findings may inspire other educators to leverage their students' analytical skills to support an organization by offering it diverse observations to consider moving forward.

### Conflicts of Interest:

I declare no conflicts of interest or financial interests that I nor my immediate family has in any product or service discussed in the manuscript, including grants (pending or received), employment, gifts, stock holdings or options, honoraria, consultancies, expert testimony, patents, and royalties.

### Treatment of Human Subjects:

South University's Institutional Review Board has approved this study.

**Disclaimer:** The statements, opinions, and data contained in all publications are those of the authors.

### References

1. Keating J, Meekers D, Adewuyi A. Assessing effects of a media campaign on HIV/AIDS awareness and prevention in Nigeria: results from the VISION project. *BMC Public Health*. 2006;6(1):123. DOI: 10.1186/1471-2458-6-123.
2. Witte K. A theoretically based evaluation of HIV/AIDS prevention campaigns along the Trans-Africa highway in Kenya. *J Health Commun*. 1998;3(4):345-363. DOI: 10.1080/108107398127157.
3. Liberatore F, Schmelzer S, Angerer A. The relevance of citizen co-creation for the effectiveness of public health campaigns: results from the evaluation of a HIV prevention campaign in Switzerland. *ZogU*. 2019;42(1-2):34-46. Coppola V, Camus O. HIV/AIDS prevention and media campaigns: Limited information? *Health Commun*. 2014;29(4):375-383. DOI: 10.1080/10410236.2012.759051.
4. Thainiyom P, Elder K. Emotional appeals in HIV prevention campaigns: Unintended stigma effects. *Am J Health Behav*. 2017;41(4):390-400. DOI: 10.5993/AJHB.41.4.3. Accreditation Council for Pharmacy Education. Accreditation Standards and Key Elements for the Professional Program in Pharmacy Leading to the Doctor of Pharmacy Degree. Published 2015. <https://www.acpe-accredit.org/pdf/Standards2016FINAL.pdf>. Accessed December 16, 2022.
5. Lombardo AP, Leger YA. Thinking about "think again" in Canada: assessing a social marketing HIV/AIDS prevention campaign. *J Health Commun*. 2007;12(4):377-397. Martin P. From social marketing to social change: a day in the life of an HIV-prevention campaign. *HIV Australia*. 2011;9(3):33-35.
6. Muscolino R. Breaking the awkward barrier with #ComePrEPd: a community-led HIV prevention campaign. *HIV Australia*. 2016;14(2):38-41.
7. Los Angeles LGBT Center. F\*ck w/out fear is the message of new Los Angeles LGBT Center campaign to reduce HIV infection rate by promoting PrEP. Published January 6, 2017. Accessed December 16, 2022. <https://lalgbtcenter.org/about-the-center/press-releases/f-ck-w-out-fear-is-message-of-new-los-angeles-lgbt-center-campaign-to-reduce-hiv-infection-rate-by-promoting-prep>.

Table 1. Students' reactions to the campaign's message presented from most to least occurring

<sup>‡</sup> Themes	<sup>†</sup> Thematic components	Frequency of responses
Approval	Amazed, appreciation, attention-grabber, authentic, bold, captivating, clever, educational, loud (positively), refreshing	(30/118*) [25%]
Questioning	Confusion, distrustful, false advertising, misleading, skeptical, unaware of HIV PrEP	(26/118*) [22%]
Disapproval	Abstinence promotion until marriage and for people with HIV, disappointment, distasteful, disturbing, inappropriate, offensive to youth, openly promoting sex, sad, uncomfortable	(25/118*) [21%]
Comical	Funny, humor, laughter	(22/118*) [19%]
Disbelief	Caught off guard, not expecting it on a billboard, shocking, surprising	(15/118*) [13%]

<sup>‡</sup>Themes resulted from students' responses that were similar in meaning.

<sup>†</sup>Thematic components included students' direct and paraphrased expressions, with some items mentioned more than other ones.

\*118 is the sum of students' first and second conveyed reactions to the question "What two words/phrases describe how you felt when viewing the "F\*ck w/out fear" campaign?"

PrEP: Pre-exposure prophylaxis