

Interprofessional HIV elective course for pharmacy and dental students builds collaborative care

Elizabeth M. Sherman, PharmD, AAHIVP^{1,2}; Marylee V. Worley, PharmD, BCIDP^{1,2};
Mark Schweizer, DDS, MPH^{1,3}; Nathan Unger, PharmD, AAHIVP⁴

NOVA SOUTHEASTERN
UNIVERSITY

NSU
Florida

¹Nova Southeastern University, College of Pharmacy; ²South Florida - Southeast AIDS Education and Training Center; ³Nova Southeastern University, College of Dental Medicine; ⁴Gilead Sciences, Inc.

BACKGROUND

- Growing deficit of providers specializing in HIV/AIDS stymies efforts to improve care for persons with HIV (PWH)
- One solution to address this issue is engaging more students during their professional curriculum by leveraging interprofessional education (IPE) modalities
- IPE programs build workforce capacity by training new health professionals with skills to work in interdisciplinary teams
- We describe the results of an IPE HIV elective course offered to pharmacy and dental students at Nova Southeastern University (NSU) in Summer 2019 as a means to garner interest in HIV and strengthen commitments to provide clinical care for PWH

OBJECTIVE

- To assess the impact of an IPE HIV elective course on student perceptions of interprofessional care team functioning, HIV-related care, services provided by an interprofessional team, and satisfaction

METHODS

- 10 students from the pharmacy and dental professional program enrolled in a 2-credit hour, 7-week IPE elective course including didactic, active, and experiential learning
- Instruction was provided by faculty from the colleges of pharmacy and dental medicine
- Students completed self-study modules from the National HIV Curriculum and attended weekly live classes covering:
 - Patient interviews (medication history, adherence)
 - Antiretroviral therapy
 - HIV pre-exposure and post-exposure prophylaxis
 - HIV testing
 - Oral healthcare and HIV
 - Opportunistic infections
 - Immunizations
- In a Ryan White-funded dental clinic exclusively serving PWH, dental-pharmacy student pairs interviewed patients to obtain medication and medical histories, educated patients on medication use and dental hygiene, and created a prioritized medication therapy problem list
- Voluntary pre-course and post-course surveys were administered
- Protocol approved by the NSU Institutional Review Board

RESULTS

- Ten students enrolled in the course (three pharmacy, seven dental), 10 pre-course surveys and 10 post-course surveys were collected (100% response rate)
 - Survey items were reported using a Likert scale where 1=strongly disagree and 5=strongly agree or a Likert scale where 1=needs considerable improvement and 5=excellent
- Mean student respondent age 26.4 years

Table 1. Knowledge and Abilities Related to Interprofessional Practice

Statement	Pre-course Survey, median	Post-course Survey, median	P-value
Current level of knowledge on the ideal functioning of interprofessional health care teams	2.5	3.5	0.046
Learning with students from other professions in helpful toward becoming a more effective health care professional	5	5	0.586
Working in an interprofessional manner complicates delivery of care	2	2	1.000
To be effective, team members should understand the roles and responsibilities of their fellow interprofessional team members	4	5	0.374
Current ability to work as a member of an interprofessional health care team	3	4	0.018
Develop trusting relationships with patients and their families	3.5	4	0.086
Involve patients in decision-making	3	4	0.187
Provide constructive feedback to team members on their performance	3	4	0.042
Respond to feedback from team members on your performance	4	4	0.089
Express opinions in a group, even when others disagree	3	3.5	0.152
Justify recommendations/actions in-person with more senior people	3.5	4	0.240
Address conflict and differences among interprofessional team members	2.5	4	0.021
Develop an interprofessional patient care plan	2.5	4	0.015

Table 2. Knowledge and Abilities Related to HIV-related Care and Services

Ability to Perform HIV-related Service	Pre-course Survey, median	Post-course Survey, median	P-value
HIV education and counseling	2	3.5	0.0126
HIV pre-exposure prophylaxis	2	3.5	0.0079
HIV post-exposure prophylaxis	2	3.5	0.0080
HIV testing	2	3.5	0.0126
Interpretation of HIV test results	2	3.5	0.0077
Opportunistic infections	2	4	0.0192
Immunizations	2.5	3	0.0749
Selecting, managing, or monitoring antiretroviral therapy	2	3	0.0213
Antiretroviral therapy adherence	2	4	0.0083
Interviewing a patient to obtain a medication history	3	4	0.0211
Delivering team-based interdisciplinary care	3	4	0.0077
Providing services to culturally diverse PWH	3	4	0.0079

Table 3. Course Satisfaction

Statement	Median (25%-75% IQR)
I was prepared to take this course	4 (4-4)
I was satisfied with the format of this course	5 (4-5)
The stated course objectives were successfully met by this course	4.5 (4-5)
I am satisfied with the National HIV Curriculum self-study component of this course	4 (4-5)
I am satisfied with the in-class didactic lectures component of this course	5 (4-5)
I am satisfied with the interprofessional practice-based experience component of this course	4.5 (4-5)
I believe information I learned in this course will assist me in my career as a dentist/pharmacist	5 (4.25-5)
I would recommend this course to a friend or colleague	5 (5-5)

CONCLUSIONS

- Students reported significant increases in confidence working as an interprofessional team member, addressing conflict, and providing constructive feedback
- Students gained significant confidence in their HIV-related care and services abilities
- Students were highly satisfied with the format, content, and IPE experiences in the course
- An IPE-focused HIV elective course for pharmacy and dental students positively impacted students' perceived understanding of HIV and interprofessional practice
- The course met its objective of strengthening collaborative care for PWH
- Limitations:
 - Single-center, initial offering and limited sample
 - Selection bias; students enrolling in the course may have preference for interprofessional practice

This presentation and resources are made possible by AETC grant award U1OHA29295 from the HIV/AIDS Bureau of the Health Resources Services Administration (HRSA), U. S. Department of Health and Human Services (HHS). The information presented is the consensus of HIV/AIDS specialists within the SEAETC and does not necessarily represent the official views of HRSA/HAB.

DISCLOSURES

Drs. Sherman, Worley, and Schwiezer report no conflict of interest and nothing to disclose. Dr. Unger is an employee of Gilead Sciences, Inc.