



ELSEVIER



CrossMark

Available online at www.sciencedirect.com

ScienceDirect

Currents in Pharmacy Teaching and Learning 7 (2015) 764–770

Currents
in Pharmacy
Teaching
& Learning

<http://www.pharmacyteaching.com>

Research

Patient vaccination education program through an introductory pharmacy practice experience

Kimberly B. Garza, PharmD, MBA, PhD^{a,*}, Margaret Williamson, PharmD, BCPS^b,
Lynn Stevenson, PharmD, BCPS^b, Benjamin S. Teeter, MS^a, Megan L. Zeek, PharmD^c,
Matt Savoie, PharmD^c, Salisa C. Westrick, PhD^a

^a Department of Health Outcomes Research and Policy, Auburn University Harrison School of Pharmacy, Auburn, AL

^b Department of Pharmacy Practice, Auburn University Harrison School of Pharmacy, Auburn, AL

^c Auburn University Harrison School of Pharmacy, Auburn, AL

Abstract

Background: Despite the fact that the herpes zoster (HZ) vaccine is recommended for all persons aged 60 years and older to prevent and lessen the severity of shingles, the vast majority of eligible adults remain unvaccinated.

Objective: To assess student knowledge, confidence, and experiences and preceptor perceptions of a student-led HZ vaccination education program (VEP).

Materials and methods: A total of 137 immunization-certified student pharmacists and 51 preceptors participated in a structured Introductory Pharmacy Practice Experience (IPPE) VEP in community pharmacies in May–August 2013. Student knowledge and confidence in providing patient education was measured pre- and post-intervention. Preceptor perceptions were measured using an online survey and student experiences were captured through post-intervention reflections.

Results: Student knowledge improved significantly from pre-test (11.04 ± 2.31) to post-test (12.48 ± 2.11) ($p < 0.001$). Confidence improved significantly in all of six areas ($p < 0.05$), and student experiences were generally positive. Preceptors also expressed positive perceptions of the program, with 13 preceptors (72%) indicating that the program was “extremely” or “very” useful in caring for patients, and 16 (89%) indicating that the program was “extremely” or “very” useful in education of student pharmacists. All preceptors were supportive of requiring a similar activity as part of the IPPE rotation in the future, with all but one indicating that they were “very” or “extremely” supportive.

Conclusions: Improvements in students’ knowledge and confidence after participating in the HZ VEP, as well as positive perceptions of the program by students and preceptors, suggest that the program provided a beneficial learning experience.

© 2015 Elsevier Inc. All rights reserved.

Keywords: Herpes zoster; Patient education; Vaccination; IPPE; Students; Preceptors

Introduction

Herpes zoster (HZ) or shingles is a vesicular skin condition caused by reactivation of latent varicella-zoster

virus from a previous chickenpox infection. HZ affects approximately one million people each year in the United States, resulting in a one-in-three lifetime risk of developing shingles. Incidence rates of HZ are highest in adults over 50 years of age and those who are immunocompromised.¹ The most prevalent major complication of HZ infection is post-herpetic neuralgia (PHN), a prolonged dermatomal pain that can persist for weeks to years after the initial skin rash has resolved.²

* Corresponding author: Kimberly B. Garza, PharmD, MBA, PhD, Department of Health Outcomes Research and Policy, Auburn University Harrison School of Pharmacy, 037 James E. Foy Hall, Auburn, AL 36830.

E-mail: kb10005@auburn.edu

A vaccine for HZ is approved by the United States (U.S.) Food and Drug Administration (FDA) for adults aged 50 years and older, and a one-time HZ vaccination is recommended by the Advisory Committee on Immunization Practices (ACIP) for all adults 60 years of age and older.³ The vaccine has proven efficacious in reducing risk of developing HZ by as much as half, as well as decreasing the incidence of PHN and burden of HZ illness substantially.⁴ Despite such proven benefits of the HZ vaccine, vaccination rates still remain well below the Healthy People 2020 goal of 30%,⁵ with only 20% of eligible patients receiving the HZ vaccine.⁶ Pharmacists and student pharmacists are well-equipped to provide vaccine education programs (VEPs) and vaccinations in a readily accessible, cost-effective manner to advance immunization status in the United States.⁷ Schools and colleges of pharmacy are being urged to consider incorporating immunization education and training into their curricula in order to improve student education and patient care.⁸

Introductory Pharmacy Practice Experiences (IPPEs) are designed to expose students to patient care activities in preparation for Advanced Pharmacy Practice Experiences (APPEs). A VEP provided by student pharmacists is an example of an IPPE activity that allows students to conduct patient interviews and assess appropriateness of treatment. This is consistent with the Accreditation Council for Pharmacy Education (ACPE) 2016 accreditation standards as it allows an opportunity for students to document competency in the affective domain-related expectations in Standards 3 and 4.⁹ Clark et al.¹⁰ and Conway et al.¹¹ conducted similar research which demonstrated that vaccine education programs have been integrated in IPPE. While these two studies were useful in terms of reported patients' and students' outcomes, preceptors' acceptance of this integration is unclear.

An IPPE program in community pharmacies provided student pharmacists from the Auburn University Harrison School of Pharmacy one-on-one counseling experience with older adults regarding HZ vaccination. Three steps were included in the VEP: assessment of current vaccination status, patient education on HZ and the vaccine, and assessment of post-education interest in obtaining HZ vaccine.¹² Participation in the HZ VEP was expected to change student pharmacists' knowledge, confidence, and attitudes towards HZ counseling in the community setting. The objective of this study was to assess the impact of the HZ vaccination education program on student knowledge of HZ and confidence level in provision of patient education, as well as student experiences and preceptor perceptions of a VEP in a community pharmacy setting. Results of patient outcomes, including awareness, pre-intervention vaccination status, and post-intervention interest in receiving the vaccine, are reported elsewhere.¹²

Materials and methods

The HZ VEP was developed for the following reasons: (1) to improve patient awareness and knowledge of HZ vaccine with an ultimate goal of promoting higher

vaccination rates in eligible patients, (2) to improve student pharmacist knowledge of HZ and HZ vaccine and their confidence in counseling patients on this subject, and (3) to allow students the opportunity to assess the feasibility of a VEP in a community pharmacy setting.

IPPEs provide student pharmacists with a two-week (80 hour) experience in a community pharmacy setting. Learning activities include medication acquisition, preparation, distribution, and patient counseling. Student pharmacists who have just completed their first academic year are assigned to a community pharmacy training site by the Office of Experiential Learning for a two-week summer IPPE. In the summer of 2013, 146 student pharmacists completed IPPEs at 49 community pharmacies including 22 (45%) chain pharmacies, 16 (33%) independent pharmacies, eight (16%) grocery store pharmacies, and three (6%) outpatient pharmacies associated with a medical clinic.

Three faculty members from the Pharmacy Practice Department and the Department of Health Outcomes Research and Policy developed the IPPE HZ VEP for student pharmacists that involved assessment of patient knowledge and perceptions of the HZ vaccine as well as patient vaccination status. This program was designed to foster application and reinforcement of knowledge and skills learned in the immunization training and other coursework.

Of the 146 students completing an IPPE during this period, 137 participated in and completed the HZ VEP. Not all students completing an IPPE experience were able to participate in the VEP due to rotation sites without eligible participants. For example, several students completed rotations at an on-campus pharmacy that services the university student population and did not have any eligible participants for inclusion in the program.

All students who participated in the IPPEs have successfully completed the American Pharmacist Association (APhA) Pharmacy-Based Immunization Program.¹³ To prepare them to participate in the HZ VEP, a 1.5 hour orientation session was provided by the faculty members in April 2013. Students were strongly encouraged to attend the session as it included an overview of the two-week IPPE, an overview of HZ and the HZ vaccine, review of the patient interview form and vaccine information sheet for the HZ vaccine, and viewing of a videotaped mock patient-student encounter previously recorded by two of the faculty members. Students were instructed to review all of the materials prior to their scheduled IPPE so that they were familiar with the information and the patient interview form. The purpose of the structured interview form was to provide students with a guide for conducting the interview in a standardized fashion.

The HZ VEP was conducted in the summer of 2013 (May–August). Students were required to complete at least five patient interviews during the two-week community pharmacy IPPE. Patients 60 years of age and older were identified by the student pharmacists with the help of their community pharmacy preceptors. The method for identification of eligible patients was left up to individual

Download English Version:

<https://daneshyari.com/en/article/10313298>

Download Persian Version:

<https://daneshyari.com/article/10313298>

[Daneshyari.com](https://daneshyari.com)