Availability of Pharmacist-Prescribed Contraception in Hawai'i

Hannah Collins-Doijode; Julia Oehlers BS; Jasmine Tyson MS; Maria Isabel Rodriguez MD, MPH; Bliss Kaneshiro MD, MPH

Abstract

In 2017, the state of Hawai'i passed Act 067 which allows trained pharmacists to prescribe hormonal contraceptives in an effort to expand access to contraception. The extent to which this policy has been implemented is not known. This study aimed to determine the proportion of Hawai'i pharmacies that currently provide pharmacist-prescribed hormonal contraceptives. In June 2020, a list of retail pharmacies was compiled using Google and Google Maps searches and pharmacy directories from major health insurance providers. Between June 23, 2020, and July 2, 2020, two trained interviewers called pharmacies and inquired about the availability of pharmacist-prescribed contraceptives using a "secret shopper" technique. Of the 175 pharmacies included in our analysis, 54 (31%) offered pharmacist-prescribed contraceptives. Kaua'i (40%) had the highest proportion of pharmacies offering pharmacist-prescribed contraceptives, followed by Maui (35%), O'ahu (30%), and Hawai'i Island (29%) (P=.88). Among pharmacies located in rural communities, 20 of 63 (32%) prescribed contraceptives, compared to 34 of 112 (30%) pharmacies located in urban communities (P=.85). Of the 118 pharmacies that did not prescribe contraceptives and provided a reason for not doing so 33% cited lack of training and 28% lack of knowledge about Act 067. Thirty-one pharmacies provided information on the cost of pharmacist-prescribed contraceptives with 71% (22) stating that the patient would have to pay extra for the consultation (mean cost = \$34.6, range \$30-\$45). Findings from this study can help inform future public health policies and implementation strategies aimed at improving contraceptive access in Hawai'i.

Introduction

Comprehensive contraceptive care, including the ability of an individual to choose what contraceptive method, if any is best for them, is a basic health care need.¹ For many individuals, the ability to choose a contraceptive method is constrained by limited access to contraceptive providers as well as the cost and availability of various methods.² Contraceptive access is multifaceted: services must be physically available, with a full range of methods, and affordable.³

In Hawai'i, several factors pose a specific barrier to reproductive health care. Hawai'i has many remote, geographically isolated communities. Individuals living in these communities face additional barriers to accessing contraceptive care. Based on the 2010 census, 93.9% of Hawai'i is considered rural, and 8.1% of the state's population live in these areas.⁴ As of 2014, only 6.4% of practicing obstetrician-gynecologists provide care in rural areas.⁵ Additionally, until 2019, the state of Hawai'i used the Title X Family Planning Program to provide publicly funded contraceptive services and supplies to approximately 15 000 patients per year across the 35 health centers across the state.⁶ More than 80% of patients who relied on this program had incomes at or below 100% of the federal poverty level (earning \$13 550 per year or less for a household of 1).⁶ In 2019, Title X funding in the state of Hawai'i ended when the state decided not to comply with some of the mandates set forth by the Trump Administration that would have prevented health care providers from giving patients any information about pregnancy termination.⁷

Recognizing the need to strengthen access to contraception, in 2017, Hawai'i expanded the scope of practice for pharmacists allowing them to prescribe self-administered hormonal contraceptives.¹² This initiative, which removes the need for a traditional in-person clinic visit with a clinician, is both an effective and cost-saving method of making hormonal contraceptives more widely available.8,10 Though not every rural town has a practicing contraceptive provider, most will have a pharmacy.9 In addition to being more abundant, pharmacies typically have longer hours than clinics and often use a walk-in service delivery model.¹⁰ Pharmacists are more likely to reach uninsured young people and to dispense a larger supply, which may help reduce unintended pregnancy by improving consistent use of contraception.8 Evidence supports that pharmacists in rural areas are as likely as their urban counterparts to prescribe hormonal contraception.11

Several other states have passed legislation allowing pharmacists to prescribe contraceptives. A study in Oregon and New Mexico found many pharmacies faced barriers to providing this service, such as being unable to bill the patient's insurance and lack of insurance reimbursement for pharmacy consultations.¹¹ To our knowledge, there have not been any studies looking at the implementation of pharmacist-prescribed contraception in Hawai'i. The purpose of this study was to determine the availability of pharmacist-prescribed contraception, to explore differences by island and rural versus urban pharmacies, and to identify potential barriers to expanding this service.

Methods

The team conducted a cross-sectional "secret shopper" telephone survey of pharmacies in Hawai'i, from June 23rd through July 2nd, 2020. The primary outcome was the proportion of retail pharmacies in Hawai'i reporting that they offered pharmacistprescription of contraception. Secondary objectives included describing the characteristics of pharmacies that did and did not provide pharmacist prescription of contraceptives based on factors such as island, rural versus urban location, population density, and whether the pharmacy was a chain pharmacy. US Census Bureau data from 2010 was used to identify whether pharmacies were in urban or rural counties.⁴ This study also sought to describe additional features of pharmacist provision of contraceptives including consultative costs and whether appointments were needed for services.

A database of pharmacies in Hawai'i was created using Google and Google Maps (Alphabet Inc., Mountain View, CA) internet application searches, and pharmacy directories from major health insurance providers. The search terms "pharmacy" and "pharmacies" were used to identify pharmacies on each island. Only retail pharmacies were included; we excluded pharmacies connected to inpatient hospital facilities, clinics, or military facilities as these sites do not serve all members of the public though they do provide services to certain groups of patients.

To assess the availability of pharmacist-prescribed contraception, 2 trained interviewers called pharmacies and used a structured data collection instrument.¹¹ Staff were asked if their pharmacists prescribe birth control without a prescription from a physician ("Hi. I heard you can get birth control from the pharmacy now without getting a prescription first. Can I do that at your pharmacy?"). If the answer was negative, the interviewer asked about the reason why the service was not offered ("Ok. Do you know why not? I thought pharmacists could now?"). If the answer was affirmative, the interviewer asked questions about the kinds of birth control available ("What kinds of birth control can I get from you?"), if an appointment was needed ("Do I need an appointment? Or can I come anytime?"), if insurance could be billed ("I have insurance that covers birth control when my doctor prescribes it. Will it work the same way? Or will I have to pay extra?" "I have QUEST/Medicaid - is that covered?"), the cost of the consultation ("Is there a consultation cost?"), and age limitations ("I am under 18. Will the pharmacist prescribe for me?"). Though the interviewers attempted to ask every question, not all questions were asked to every pharmacy in order to keep the conversations as natural as possible.

Qualtrics software (Qualtrics, Provo, UT) was used for data management and the dataset was extracted to IBM SPSS Statistics for Window software, Version 26 (IBM Corporation, Armonk, NY) for analyses. Descriptive analyses were used to characterize our study sample.¹³ The proportion of pharmacies that provided pharmacist prescription of contraceptives was determined. The mean consultation cost was calculated. If a pharmacy provided a range for the cost, for example, \$35.00 to \$40.00, the mean for this range (\$37.50) was used to calculate the overall mean consultation cost.

This study was reviewed and approved by the Queen's Medical Center Institutional Review Board and Institutional Review Committee at the University of Hawai'i.

Results

One hundred and ninety-two pharmacies met the inclusion criteria including 117 on O'ahu, 31 on Hawai'i Island, 23 on Maui, 19 on Kaua'i, 1 on Moloka'i, and 1 on Lana'i. Of these, 17 were excluded from our analysis for the following reasons: 11 phone numbers were no longer in service, 3 pharmacies were permanently closed, 1 pharmacy was closed until further notice, and 2 pharmacies' responses were incorrectly recorded. Responses were recorded for the remaining 175 pharmacies. Of these, 54 pharmacies (31%) reported they prescribe contraceptives and 121 (69%) did not. Of the pharmacies that did not prescribe contraceptives, 118 provided a reason, including that pharmacists were not trained (39, 33%), they were unaware of the policy (33, 28%), the pharmacy did not carry contraceptives or only carried emergency contraceptives (18, 15%), unsure (10, 9%) or other (18, 15%).

The majority of pharmacies prescribing contraceptives (51/54, 94%) were chain pharmacies (CVS, Times, Costco, Safeway) including 41 CVS pharmacies. The proportion of pharmacies that prescribe contraceptives was not significantly different by island with Kaua'i (40%) followed by Maui (35%) and O'ahu (30%), and Hawai'i Island having the lowest (29%) (Table 1) (P=.88). Pharmacist provision of contraception was not available on Moloka'i or Lana'i, both of which had only 1 pharmacy that met the inclusion criteria for the survey (Table 1). Among pharmacies located in rural communities, 20 of 63 (32%) prescribed contraceptives compared to 34 of 112 (30%) pharmacies located in urban communities (P=.85). Using post hoc calculations it was determined that the sample size of 175 and the proportion of rural versus urban pharmacies noted in this sample, resulted in the ability to detect 19% difference in the proportion of pharmacies that prescribed contraceptives.

Figure 1 displays a map of pharmacies in Hawai'i that prescribe contraception in relation to population density.^{4,14} The majority of pharmacies that prescribe contraception are located in areas of high population density.

Of the 54 pharmacies that prescribed contraceptives, 45 answered the question about whether an appointment was required to obtain contraceptives and 34 (76 %) of those did not require an appointment for a consultation. When asked "I have insurance that covers birth control when my doctor prescribes it. Will it work the same way? Or will I have to pay extra?" 31 pharmacies responded. There were 71% (22) that stated that the medications were covered but the consultation was not and the patient would have to pay extra, 19% (6) stated that the visit and medications would be covered in the same way, and 10% (3) stated that it depended on the type of insurance the caller had. When asked specifically about QUEST/Medicaid, 37

Table 1. Pharmacies Prescribing Contraceptives by Island			
Island	Number of Pharmacies Surveyed (n=175)	Surveyed Pharmacies Prescribing Contraceptives	% of Pharmacies Prescribing Contraceptives
Kauaʻi	15	6	40%
Maui	20	7	35%
Oʻahu	110	33	30%
Hawai'i Island	28	8	29%
Molokaʻi	1	0	0%
Lana'i	1	0	0%
Total	175	54	31%



pharmacies responded and 21 (57%) stated there would be an additional charge for the consultation but the medication was covered, 7 (19%) stated that the cost would be the same as if they went to a doctor's office and 9 (24%) stated that they were unsure. Thirty-six of the 54 pharmacies (67%) provided a dollar amount for the consultation fee ranging from \$15to \$45 with a mean of \$35 (SD = \$5.57). Four pharmacies reported there was a consultation fee but were unsure how much the consultation would cost. Forty-one pharmacies answered the question about whether the pharmacist would prescribe to a minor with 33 (81%) stating they would not, 5 (12%) stating that they would, and 3 (7.3%) reporting they were unsure.

When asked about the types of contraceptive methods available, the most common response was that it would depend on the consultation (29/54, 53%). One pharmacy stated that they were not sure what types of contraception they could provide. Six pharmacies stated they would provide any type of contraception. Four pharmacies earned the response of "other," that it would depend on the patient's insurance. Fourteen pharmacies indicated that they provided specific methods. All fourteen stated that they provide oral contraceptives (14/54, 26%), eight stated they would provide the contraceptive patch (8/54, 15%), four stated they would provide the contraceptive ring (4/54, 7%), and two stated they would provide injectable contraceptives (2/54, 4%).

Discussion

Three years after the passage of Act 067, the results of this study suggest that only about a third of pharmacies prescribe contraceptives. Most pharmacies that prescribe contraceptives are located in areas of high population density (towns and cities with a population density of at least 401 people per square mile) and were provided through chain pharmacies. Pharmacies on islands with smaller populations, such as Lana'i and Moloka'i, did not offer this service. Areas with higher population density tend to have clinics and healthcare centers where patients can obtain contraception through a physician or advanced practice clinician. Therefore, the findings of this study make a compelling argument that the greatest need for the pharmacist provision of contraceptives is in rural areas and that this need is not yet being met despite the passing of legislation meant to increase access to reproductive healthcare.

The proportion of Hawai'i pharmacies that prescribe contraception (31%) is higher than what has been reported in states such as New Mexico (19%) and California (5%), but lower than Oregon (46%).^{11, 15} At the time of the study by Rodriguez, et al, laws allowing pharmacist provision in New Mexico had been in place for a little less than 2 years which may have factored into the lower provision rates when compared with our findings in Hawai'i.^{11, 12} This may also be the reason for California's low provision rates, as their study was conducted only a year after statewide implementation.¹⁵ The reasons for Hawai'i's lower provision rates when compared to Oregon may be due to differences in reimbursement practices. In Oregon, Medicaid has reimbursed for both the pharmacists' time and the contraceptive since the program began.^{11, 12}

Pharmacists in Hawai'i do not currently have a mechanism for seeking reimbursement for consultation time from insurance companies. This may reflect why we found that a majority of pharmacies in Hawai'i (71%) were charging for services, with a mean out-of-pocket payment of \$35. Creating a mechanism where pharmacists bill insurance for the counseling time may reduce costs to the consumers and promote the expansion of pharmacist prescription of contraception in Hawai'i.

Act 067 requires that pharmacies not require an appointment for contraceptive consultations to promote access.¹² This study found that the majority of pharmacies prescribing contraceptives did not require appointments to be made prior to a visit in accordance with the law. While Act 067 did not specifically mandate pharmacists to prescribe contraception for minors; Hawai'i Revised Statutes 577A does specifically allow individuals 14 years of age and older to consent to family planning services on their own. However, this study found that 81% of pharmacists would not prescribe to a minor, suggesting a need for education on the rights of minors in Hawai'i.

This study should be interpreted with the following limitations in mind. First, it is limited by a small sample size and thus is underpowered to detect differences in outcomes. The secret shopper method sometimes prevented the interviewers from asking every question. However, the question addressing the primary outcome - whether or not a pharmacy prescribed contraception - was prioritized and asked to every pharmacy. Also, interviewers did not have a systematic method for determining the availability of each birth control method; therefore, the results for this outcome may not be complete. The data collection tool was not equipped to completely capture the nuanced rationales for pharmacies not adopting pharmacist provision of contraceptives. For example, 1 pharmacist reported that he did not feel comfortable prescribing birth control by himself and would only prescribe if the patient needed a refill and could not get to a doctor. The secret shopper methodology used in this study also has inherent limitations. Though it provided a glimpse of what consumers experience in seeking contraceptives from a pharmacist, it may not have been necessary to obtain information. Pharmacists may have been more forthcoming with information on their rationale for not providing contraceptives if they did not think they were speaking to a consumer. Of note, investigators involved in this study are conducting a study to directly survey pharmacists about motivators and obstacles to the implementation of pharmacist provision but this study has been hindered by a low response rate.

This study provides a snapshot of what pharmacist provision of contraceptives looks like in Hawai'i 3 years after the passage of Act 067. It has determined the percentages of pharmacies that

have pharmacists taking advantage of their expanded scope of practice in Hawai'i as well as their locations in relation to the population density in various communities. It was also able to identify possible barriers pharmacies face to prescribing contraception. Findings from this study can help inform future public health policies aimed at improving contraceptive access in Hawai'i, particularly in rural and underserved areas. Future research should be focused on understanding the reasons behind low pharmacist certification for prescribing contraception and looking into incentives and barriers that may exist in implementing this service statewide.

Disclosure Statement

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Conflict of Interest

None of the authors identify a conflict of interest.

Authors' Affiliations:

- Johns Hopkins University, Baltimore, MD (HC)
- University of Oklahoma, Norman, OK (JO)
- Department of Obstetrics, Gynecology & Women's Health, John A. Burns School of Medicine, University of Hawai'i, Honolulu, HI (JT, BK)
- Department of Obstetrics & Gynecology, Oregon Health and Science University, Portland OR (MI)

Corresponding Author: Bliss Kaneshiro MD, MPH; 1319 Punahou Street, #824, Honolulu, HI 96826; Email: blissk@hawaii.edu

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