Expanding Access to Contraception: Identifying Accessibility Gaps Across Hawai'i Communities

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Abstract

In 2019, Hawai'i ended its Title X program resulting in a loss of federal family planning funds. Additionally, physician shortages have decreased family planning resources available to patients. The objective of this study was to assess contraception availability by determining the number and location of healthcare providers in Hawai'i that prescribed at least one form of contraception. A list of healthcare providers was compiled using Google searches, major health insurance, and hospital provider directories. Providers were organized by physical location (ie, address). Each location was contacted to inquire about each provider's ability to prescribe different forms of contraception (eg, intrauterine device, implant, injection, pill, patch, or ring). Of the 1,020 locations contacted, 274 prescribed at least one form of contraception. Of the 1,810 providers surveyed at these locations, 744 prescribed at least one form of contraception. In regard to insurance, 201 locations and 609 providers accepted at least one form of Medicaid. Most prescribing providers were located on the island of O'ahu. The majority of providers across the state prescribed the pill, patch, or ring. There are many additional barriers that were not addressed in this study, including factors that affect physician prescribing practices. Identifying these barriers is important to further address gaps in contraceptive accessibility. Consideration of improved support for training in specialties such as Family Medicine, Internal Medicine, and Pediatrics can expand access to contraception within primary care settings.

Keywords

Contraception, family planning, Title X, intrauterine device

Abbreviations

AAFP – American Academy of Family Physicians GIS = geographical information system IUD = intrauterine device LARC – Long-acting reversible contraception OB/GYN = obstetrician-gynecologist UHFMRP – University of Hawai'i Family Medicine Residency Program

Introduction

There is no one-size-fits-all approach to pregnancy planning. While some individuals actively plan pregnancy, others may allow for the possibility of pregnancy at various points in their life without actively seeking or preventing pregnancy. An individual's desire for pregnancy exists on a continuum and changes over time. No one contraceptive method is right for everyone. A pregnancy planning framework that accommodates an individual's reproductive goals, values, and needs at each point on the pregnancy planning continuum is necessary.¹ A patient-centered approach allows providers to more effectively address patient concerns and integrate patient perspectives into contraceptive decision-making.² Contraceptive counseling and access to contraception are also critical in reducing unwanted pregnancy, improving pregnancy outcomes, and allowing individuals to take control of their own fertility to achieve their reproductive life goals.³

For an individual to have access to contraception, they must have insurance coverage and access to providers that prescribe the full range of contraceptives including short-acting methods like combined hormonal contraceptives (eg, pill, patch, or ring), injections (eg, depot medroxyprogesterone acetate), and longacting reversible methods like implants and intrauterine devices (IUDs).⁴ The "best" form of contraception varies between patients depending on their preferences, medical comorbidities, attitudes toward contraception, and prior experiences with contraception.⁴ Access to a variety of short- and long-term contraceptives allows individuals to select the method that works best for them.

Individuals in Hawai'i face unique challenges in obtaining healthcare due to the geographical distribution of providers across the state. In rural areas of Hawai'i, where the physician shortage is the most pronounced,⁵ there may be limited access to providers who can prescribe the variety of contraceptives needed to support a patient-centered approach to reproductive planning. This deficit in care highlights gaps in accessibility that need to be filled. Additionally, in 2019, Hawai'i was 1 of 6 states to end Title X programming. Title X is a nationally administered federal program that provides comprehensive family planning services to individuals with financial barriers to healthcare. Prior to 2019, Title X funds in Hawai'i supported a total of 32 health centers across the state. According to the 2015 Title X Family Planning Annual Report, Title X served approximately 15,746 patients with incomes at or below 100% of the federal poverty level. There were 15 Title X funded clinics in Honolulu County, 9 in Hawai'i County, 6 in Maui County, and 2 in Kaua'i County.⁶ The physician shortage combined with the loss of Title X funding may have exacerbated existing barriers and reduced many individuals' ability to access contraception and maintain reproductive autonomy.

Access to a wide range of contraceptive methods plays an integral part in allowing people to fully participate in their health decisions. There are many barriers that exist in accessing contraceptive care in Hawai'i. For example, providers are not equally distributed across the islands and do not always implement the same prescribing practices. Additionally, reduced funding for clinics can result in shorter hours of operation, decreased outreach and education, and decreased availability of more costly contraceptives, like IUDs.6 Future endeavors aimed at increasing the number of contraceptive providers should be based on the current availability of services; therefore, it is critical to assess the availability of contraceptive providers across communities in Hawai'i. Additionally, while many patients receive contraceptive care through their obstetrician-gynecologist (OB/ GYN) provider, specialties such as Family Medicine, Internal Medicine, and Pediatrics may provide contraceptive care within their primary care setting. Not all primary care physicians are experienced in providing this service, so it may help to remove barriers to access by increasing training and support for physicians in these specialties both during and after residency.

Methods

Across-sectional phone survey of provider offices was conducted to determine the availability and location of contraceptive providers across Hawai'i. This study was reviewed and determined to be not human studies research and therefore exempt by the University of Hawaii Office of Research Compliance Human Studies Program (2019-00716). A database of providers (Family Medicine, OB/GYN, Internal Medicine, Pediatrics, and Advanced Practice Providers) in Hawai'i was compiled from August 2019 through December 2019 using Google and Google Maps searches and directories from major health systems and insurance plans. Google searches were conducted for a specific island or city/town using the search term "birth control" (eg, "birth control Honolulu"). Insurance and hospital directory search terms included: "Women's Health", "Obstetrics", "OB/ GYN", "Family Medicine", "Internal Medicine", and "Pediatrics". Military providers, specialized internal medicine physicians, such as cardiologists, individuals who were no longer practicing in Hawai'i, offices that were permanently closed, and providers who were retired or deceased were excluded from the study.

Once providers were identified, a cross-sectional phone survey of provider offices was conducted from January 2020 through August 2020. Each clinic location was surveyed to determine the number of providers, forms of contraception available, and whether or not the practice accepted at least one form of Medicaid. Providers who practiced at multiple locations on 1 island were counted as 1 individual prescribing provider. If a provider practiced at multiple locations, each office was included as a unique location. A maximum of 3 attempts were made to contact all offices on the compiled list of providers. If an office could not be reached after 3 attempts, they were removed from the list. A cut-off of 3 attempts was selected based on the assumption that it was unlikely a prospective patient would call the same phone number more than 3 times after receiving no response.

After completing data collection, heat maps were generated using Google My Maps (Google, Mountain View, CA) and Google Drawing (Google, Mountain View, CA) to illustrate the density of providers that prescribed contraception across each island. Population density maps from the 2010 U.S. Census data were used as the foundation for the maps. Approval for use of these maps was obtained from the Hawai'i State Geographical Information System (GIS) Program. Inclusion and exclusion criteria for providers and locations are described in Figure 1.

| Table 1. Contraception Prescription Practices by Provider in Hawai'i, 2020 | | | | | | | | | | | | | |
|--|-----------------------|--|-----|---|-----|--|-----|--|-----|--|-----|-------------------------------------|-----|
| Island | Providers surveyed | Providers prescribing at least one form of contraception ^a | | Providers prescribing IUD ^b | | Providers prescribing implant ^o | | Providers prescribing Depo ^b | | Providers prescribing pill, patch, ring ^ь | | Providers accepting Medicaid⁵ | |
| | No. | No. | % | No. | % | No. | % | No. | % | No. | % | No. | % |
| Hawaiʻi | 319 | 90 | 28 | 71 | 79 | 63 | 70 | 65 | 72 | 90 | 100 | 72 | 80 |
| Oʻahu | 1,132 | 503 | 44 | 313 | 62 | 324 | 64 | 416 | 37 | 503 | 44 | 410 | 36 |
| Maui | 169 | 63 | 37 | 31 | 49 | 28 | 44 | 41 | 65 | 63 | 100 | 45 | 71 |
| Kaua'i | 161 | 79 | 49 | 34 | 43 | 30 | 38 | 31 | 39 | 75 | 95 | 73 | 92 |
| Lana'i | 6 | 6 | 100 | 0 | 0 | 4 | 67 | 6 | 100 | 6 | 100 | 6 | 100 |
| Molokaʻi | 23 | 3 | 13 | 3 | 100 | 3 | 100 | 3 | 100 | 3 | 100 | 3 | 100 |
| State Total | 1,810 | 744 | 41 | 452 | 61 | 452 | 61 | 562 | 76 | 740 | 99 | 609 | 82 |

^a Based on all eligible providers. ^b Based on providers who prescribe contraception.

Results

A total of 744 providers prescribed at least one form of contraception across all islands. Table 1 describes the location of these providers. A total of 274 clinics prescribed at least 1 form of contraception. Table 2 describes the location of these clinics. O'ahu had the most providers and clinics prescribing at least 1 form of contraception, while Lana'i and Moloka'i had the least. The majority of locations serving O'ahu were located in Honolulu (Figure 2). Of the providers prescribing at least 1 form of contraception, 100% (3/3) provided IUDs on Moloka'i, while 0% (0/6) provided IUDs on Lana'i. Across the State of Hawai'i and on each individual island, the most prescribed forms of contraception were the pill, patch, and ring. On Moloka'i, all methods were prescribed by all 3 providers at a single location. Tables 1 and 2 describe the providers and clinics accepting at least one form of Medicaid. With regard to providers prescribing at least one form of contraception, 609 out of 744 accepted at least one form of Medicaid (82%). Of the 274 clinics prescribing at least one form of contraception, 201 clinics accepted at least one form of Medicaid (73%).



practicing in Hawai'i, offices that were permanently closed, and providers who were retired or deceased.

| Table 2. Contraception Prescription Practices by Location in Hawai'i, 2020 | | | | | | | | | | | | | |
|--|-----------------------------------|--|----|---|-----|--|-----|--|-----|--|-----|---|-----|
| Island | Locations surveye ^d | Locations prescribing at least one form of contraception ^a | | Locations prescribing IUD ^b | | Locations prescribing implant ^o | | Locations prescribing Depo ^b | | Locations prescribing pill, patch, ring ^b | | Locations accepting Medicaid ^ь | |
| | No. | No. | % | No. | % | No. | % | No. | % | No. | % | No. | % |
| Hawaiʻi | 201 | 50 | 25 | 35 | 70 | 34 | 68 | 35 | 68 | 48 | 96 | 37 | 74 |
| Oʻahu | 651 | 174 | 27 | 95 | 55 | 93 | 53 | 117 | 67 | 172 | 99 | 121 | 70 |
| Maui | 99 | 25 | 25 | 10 | 40 | 8 | 32 | 12 | 48 | 25 | 100 | 18 | 72 |
| Kaua'i | 56 | 21 | 38 | 10 | 48 | 10 | 48 | 12 | 57 | 20 | 95 | 21 | 100 |
| Lanaʻi | 4 | 3 | 75 | 0 | 0 | 2 | 67 | 3 | 100 | 3 | 100 | 3 | 100 |
| Moloka'i | 9 | 1 | 11 | 1 | 100 | 1 | 100 | 1 | 100 | 1 | 100 | 1 | 100 |
| State Total | 1,020 | 274 | 27 | 151 | 55 | 148 | 54 | 180 | 66 | 270 | 99 | 201 | 73 |

^a Based on all eligible locations with at least one provider who prescribes contraception. ^b Based on locations with providers who prescribe contraception.



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Discussion

There are many factors that contribute to a patient's ability to access contraception. Availability and location of providers can greatly impact how easily a patient is able to see a provider. In addition, providers of different specialties may receive different training or have different comfort levels in prescribing certain types of contraceptives.⁷ This poses a barrier for patients who desire a type of contraceptive that their provider may not be trained to provide. Insurance plays a role in accessibility since not all providers accept Medicaid and insurance does not reimburse all providers of reproductive health services equally. These barriers influence an individual's ability to take control of their reproductive health.

In Hawai'i, the location of contraceptive providers can pose a significant barrier to patients. This is a particular concern for people in rural communities. The lack of access to contraception in rural communities is in part due to the physician shortage, particularly in primary care, as demonstrated by the 2016 Hawai'i Physician Workforce Assessment⁵ and again demonstrated in the 2020 workforce assessment in this supplement.¹⁰ Islands with higher population density, such as O'ahu, have more contraceptive providers and greater variety in the types of contraceptives available. On the neighbor islands, where there are fewer providers, the accessibility gaps were pronounced. In general, long-term forms of contraception, such as IUDs and implants, are not as readily available in rural areas. For example, a patient on Lana'i is unable to get an IUD without traveling to another island. However, there were exceptions to this. On Moloka'i, contraceptive providers on the island provided all forms of contraception. Most of the providers across the state prescribe the pill, patch, or ring, making these the most accessible forms of contraception (Table 1). The authors anticipated that methods which require specialized training to insert (IUD and implant) may be less accessible in areas with fewer providers. Upcoming efforts to improve contraceptive access should focus on training providers in rural areas. Additionally, as providers often move, training programs must be regular, ongoing endeavors.

Though conversations with providers and their office staff were not captured in a systematic fashion, many Internal Medicine and Family Medicine physicians stated that they referred patients who desired contraception to an OB/GYN even though they were able to prescribe contraception in some circumstances. One primary care location surveyed stated that primary care physicians do not receive the same level of compensation for birth control services as their OB/GYN counterparts, prompting them to refer patients out for contraceptive care. These anecdotes suggest that while prescribing contraception may be within a provider's scope of practice, other factors may prevent them from providing this care. Internal Medicine and Family Medicine physicians located on more rural islands tended to primarily prescribe oral contraception. Further research should investigate the barriers physicians face when prescribing different forms of contraceptives to elucidate this finding. The phone survey also revealed difficulties from the patient perspective of finding a provider to obtain contraceptives. This study implemented methods typically utilized by patients, such as Google searches or insurance and hospital directories. The information found through these search methods was often outdated, with many inconsistencies in address and phone number, and included providers who were no longer practicing.

Although this study provides much-needed insight into a patient's ability to access contraception, it is not without limitations. Respondents to this phone survey included front desk staff, medical assistants, or physicians who have different knowledge of what contraceptive methods are available to patients. This may have an impact on the accuracy of the data. With larger practice locations, the types of birth control methods offered were generalized to the entire clinic as opposed to individual providers. For example, in a large, multispecialty location with Internal Medicine physicians, Family Medicine physicians, OB/ GYNs, and Nurse Practitioners, receptionists were unable to provide information on what each clinician provided but knew that all methods were available at their site. Thus, the number of clinicians who provided various forms of contraception may be an overestimate of the true number of contraceptive providers. The authors sought to overcome this limitation by also describing the number of locations where contraceptives were available as this may more accurately represent the availability of a contraceptive method. Another limitation to the study was the inability to reach all providers. Some of our phone calls took place after the COVID-19 pandemic began. Although most clinics resumed normal business hours and continued to answer phone calls, some may have had reduced hours for certain periods of time. This factor could have resulted in the underestimation of the number of contraceptive providers and clinic locations surveyed.

This study primarily focuses on identifying gaps in accessibility to contraception based on geographical access to providers. One solution to these gaps in access is to increase training and support for primary care physicians (such as Family Medicine, Pediatrics, and Internal Medicine) both during and after residency so they may offer full spectrum reproductive health care within the primary care setting. In particular, Family Medicine physicians are at the frontlines of providing primary care for people of all ages and backgrounds. This makes the specialty well situated to offer contraceptive counseling and services at any point along a person's family planning journey. Family Physicians tend to provide the majority of primary care in rural and urban underserved areas both in Hawai'i and nationally. While the ability to offer contraceptive services without need for referral does not account for all of the barriers previously mentioned, this could expand family planning care for patients within their medical homes and provide this service where access may otherwise be limited. Training on comprehensive sexual and reproductive health is required during the 3 years of family medicine residency. Per the American Academy of Family Physicians, "At the completion of residency training, a family medicine resident should be able to: offer patient-centered, comprehensive contraceptive counseling and options, including long-acting reversible contraception..."⁸

The University of Hawai'i Family Medicine Residency Program (UHFMRP) serves a population that is close to 50% Medicaid. One of the program's aims is to train residents who will continue to practice in Hawai'i upon graduation. Unpublished internal data collected by UHFMRP shows that over the past 10 years, 72% of residents chose to practice in Hawai'i in their first job after graduation. Forty-three percent of these graduates chose positions in areas of physician shortage or at federally qualified health centers across the state. Given the large number of graduates who stay and practice in Hawai'i, UHFMRP has a unique opportunity to train primary care physicians who can offer full spectrum reproductive health care and thus increase access across the state. The UHFMRP's current training in women's health is focused on teaching its physician residents a patientcentered, unbiased approach to comprehensive contraception counseling. They have implemented a Buy and Bill program to allow for same day long-acting reversible contraceptive (LARC) insertions. This teaches residents the importance of access and builds capacity to do this in their future practice. Hawai'i Residency Programs in Family Medicine, Pediatrics, OB/GYN, and Internal Medicine can expand their current collaborations to emphasize training in contraception care given the potential to encounter patients with this need in all of these aforementioned specialties. This could significantly expand contraceptive services to patients across the state. Providing a network of support and ongoing training for physicians in the community may also empower them to continue to offer these services post-graduation. Additionally, recruiting students to JABSOM from rural communities will also likely address the workforce shortage in those areas for all specialties, not only those that provide reproductive health services.9

More research is needed to elucidate the most significant barriers to access to reproductive care in Hawai'i so that concerted efforts can be made to overcome those specific barriers. Future studies should address the multitude of other factors that impact access to contraception and how they influence the behavior of patients seeking contraception. The impact of insurance coverage and cost is an important area to investigate further in order to address the socioeconomic factors that affect an individual's choice for a provider as well as a provider's choice about offering this service. The discontinuation of Title X in 2019 may have further exacerbated the barriers to contraceptive options, particularly for patients from low-income backgrounds. Identifying these barriers is an essential step in improving overall access to contraception, increasing contraceptive options, encouraging shared patient-provider decision-making, and properly targeting future endeavors aimed at increasing the availability of contraceptive providers. Improved access to family planning services is vital for comprehensive care of all patients and for the health of Hawai'i's communities.

Conflict of Interest

None of the authors identify a conflict of interest.

Disclosure Statement

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