



Brief Research Article

An exploratory survey regarding the Maryland Contraceptive Equity Act: clinician awareness and impact on contraception provision



Aneesha Cheedalla^a, Jessica K. Lee^b, Anne E. Burke^{a,*}

^a Department of Gynecology and Obstetrics, Johns Hopkins University School of Medicine, Baltimore, MD, United States of America

^b Department of Obstetrics and Gynecology, University of Maryland Medical System, Baltimore, MD, United States of America

ARTICLE INFO

Article history:

Received 16 June 2020

Revised 4 December 2021

Accepted 22 December 2021

Keywords:

Access

Awareness

Contraception

Equity

Health policy

Legislation

ABSTRACT

Objective: The Maryland Contraceptive Equity Act took effect in January 2018 with the goal of reducing insurance barriers to contraception. We sought to assess the Act's impact on contraceptive provision.

Study Design: From March–August 2019, we emailed an exploratory survey to clinicians providing contraception in Maryland that queried awareness of the Act and changing practices.

Results: The survey had a 13% response rate (164/1256 clinicians). Fifty (31%) were aware of the Act. Clinicians rated the Act was somewhat likely to change prescribing practices (3.5/5 point Likert Scale, SD 1.3).

Conclusion: The majority of clinicians providing contraception in Maryland are not aware of the Act. If aware of the Act, clinicians may change their contraceptive prescribing practices.

© 2021 Published by Elsevier Inc.

This is an open access article under the CC BY-NC-ND license (<http://creativecommons.org/licenses/by-nc-nd/4.0/>)

1. Introduction

Barriers to contraceptive access, including cost, multiple visits, and limitations on refills, increase the rate of unintended pregnancy [1–3]. The federal government eliminated co-payments for contraception for most private and Medicaid expansion plans through the Affordable Care Act [4]. Similarly, states have been addressing systems-level barriers to contraception access [5]. In Maryland, the Contraceptive Equity Act (from now on referred to as “the Act”) went into effect in January 2018 [6]. The Act's provisions eliminate co-payments for most forms of contraception, remove prior authorization requirements (a process run by some health insurance companies in the United States before they will cover certain prescribed medications) for long-acting reversible contraception (LARC), require insurance coverage for emergency contraception, increase insurance coverage for vasectomies, and allow single dispensing of up to a 12 month supply of prescription contraceptives [7, 8]. The act prohibits cost-sharing of contraceptives for individuals covered by insurance in Maryland.

The Act was intended to increase access to contraception. Clinician awareness and beliefs are key components of policy utilization for legislation affecting prescribing [9]. We sought to administer an exploratory survey to assess clinician awareness of the Act's

policies in Maryland, to determine the Act's impact and recognize possible gaps in policy implementation.

2. Methods

We sent an exploratory online survey to 1256 clinicians affiliated with Johns Hopkins University, University of Maryland, and the Maryland section of the American College of Obstetricians and Gynecologists (ACOG). We sent clinicians in these 3 organizations surveys if they were physicians, nurse practitioners, nurse midwives, or physician assistants working in specialties likely to provide contraception: obstetrics and gynecology (Ob/Gyn), internal medicine, pediatrics, medicine-pediatrics, or family medicine. Institutional Review Boards at both universities approved the study. As this was an exploratory study, we used a convenience sample and did not calculate a sample size for this study. Study investigators developed the survey and were informed by the algorithm of Qualtrics, a web-based survey platform.

We emailed the survey to clinicians between March to August 2019. Investigators sent emails twice to Johns Hopkins Hospital clinicians and once to Johns Hopkins Community Providers with the subject line “Research survey on contraception.” Investigators sent emails once to the University of Maryland (UM) clinicians in family medicine and ACOG members. We sent the emails twice to UM Ob/Gyns. We sent these other emails with the subject line “Support Medical Student Research.” The variation in emails was

* Corresponding author.

E-mail address: aburke@jhmi.edu (A.E. Burke).

Table 1
Demographic characteristics of survey respondents in Maryland, 2019 (Total N = 164)

Variable	Number (%)
Practitioner specialty	
Family Medicine	22 (13.4)
Obstetrics and Gynecology	67 (40.9)
Internal Medicine	40 (24.4)
Medicine-Pediatrics	13 (7.9)
Pediatrics	22 (13.4)
Practitioner type	
Physician (completed residency)	91 (55.5)
Physician (resident)	58 (35.4)
Advanced Practice Provider (Nurse Practitioner, Physician Assistant, Certified Nurse Midwife)	15 (9.1)
Years since completing residency	
1–10	42 (42.9)
11–20	27 (27.6)
>20	29 (29.6)
Type of Practice	
Academic faculty practice	113 (68.9)
Group or solo practice affiliated with academic institution	44 (26.8)
Independent group or solo practice	7 (4.3)
Percentage of patients privately insured	
<50%	115 (70.6)
51–75%	26 (16.0)
>75%	22 (13.5)
Frequency of prescribing contraception	
Rarely (few per year)	47 (28.7)
Occasionally (few per month)	40 (24.4)
Often (more than once a week)	77 (47.0)

due to different administrators contacting each group. Clinicians could complete the survey if they indicated that they prescribed contraception on a screening question. We did not offer an incentive for survey completion. We collected demographic information to assess clinician type and practice setting. Through the 22-item survey, we assessed awareness of each provision of the Act and queried whether clinicians had responsively changed their practices. We assessed awareness of the Act by asking “Before taking this survey, have you heard of the Contraceptive Equity Act of Maryland?” to which clinicians responded “Yes,” “No,” or “Unsure.” Clinicians reported the likelihood of changing their practice after in-survey description of the Act’s provisions and their perception of potential impact of the Act on contraceptive access on 5-point Likert scales (1: extremely unlikely-5: extremely likely). LARC-specific questions assessed whether respondents continued two-visit protocols and prior authorization requirements after the Act lifted these requirements.

We analyzed data using Stata version 15.1 (Statacorp, College Station, TX). We tabulated descriptive statistics of survey responses. We used Fisher’s exact test to determine associations between respondent demographics and responses.

3. Results

A total of 164 clinicians completed the exploratory survey of 1256 clinicians emailed (response rate 13%). The separate response rates for the academic medical centers and ACOG were 20% (151 of 769 clinicians) and 3% (13 of 487 clinicians), respectively. A majority of respondents were clinicians in Ob/Gyn, physicians, practicing in an academic faculty setting, located in Baltimore City, and with less than 25% of their patients privately insured (Table 1).

Fifty respondents (31%) were aware of the Act prior to the survey, while 22 (13%) were unsure and 92 (56%) had not heard of it. Ob/Gyn clinicians had the highest baseline awareness of the Act (33 (49%)), while internal medicine had the lowest (5 (13%)). Forty-eight percent of respondents who prescribed contraception often were aware of the Act, compared to 13% of respondents who prescribed contraception rarely. We found no association between

years post-residency and awareness of the Act ($p = 0.47$), or percentage of uninsured patients and Act awareness ($p = 0.45$).

Respondents were most aware of the Act’s provision removing co-payments for most forms of birth control, and were least aware of the provision that lifted prior authorization requirements (Table 2). When comparing provisions, we found that counseling practices changed most frequently for insurance coverage for emergency contraception, prescribing practices changed for hormonal contraception filled in 12 month periods, and administrative practices changed with removal of prior authorization requirements.

Clinicians indicated on a 5-point Likert scale that the Act was neither likely or unlikely to change contraceptive counseling (3.4/5, SD 1.3) or administrative practices (3.2/5, SD 1.3), and somewhat likely to change prescribing practices (3.5/5, SD 1.3). Scores did not differ between specialties or prior knowledge of the Act.

Of clinicians providing LARC, 22 of 42 (52%) reported fewer prior authorization requirements since January 2018. Respondents who did not remove prior authorization requirements mainly cited insurance requirements as their largest barrier (53%).

After being provided a description of the Act, 58% of respondents thought the Act would have a very positive impact on patient access to LARC and 40% thought that the Act would have a very positive impact on access to short-acting contraceptives (31% of these respondents were previously aware of the Act). Respondents reported that the act would have a somewhat positive impact on healthcare disparities and practice logistics (25% and 33% were previously aware of the Act, respectively).

4. Discussion

This exploratory study shows that a majority of clinicians in our study were unaware of the Act. However, many respondents were familiar with its individual provisions. Our data suggest clinician awareness of state healthcare legislation surrounding contraception needs to increase. These data may also be reflective of clinician awareness regarding state healthcare legislation as a whole, suggesting need for increased clinician engagement to achieve legislative goals.

Table 2

Provider awareness of the Maryland Contraceptive Equity Act prior to survey administration and reported changes in counseling, prescribing, and administrative practices based on individual provisions of the Act since January 2018 (Total N = 164)

Question	I was previously aware of the provision n (%)	I counsel my patients about the provision n (%)	My prescribing practices have changed because of the provision n (%)	The provision has changed administrative procedures in my practice n (%)
Birth control pills can be filled in 12-month periods	62 (38)	16 (10)	21 (13)	4 (2)
Pre-authorization requirements for IUDs and Implants lifted	36 (22)	7 (4)	7 (4)	14 (9)
Insurance coverage for emergency contraception	52 (32)	29 (18)	11 (7)	2 (1)
Elimination of co-payments for most forms of birth control	68 (42)	24 (15)	8 (5)	5 (3)
Broadened coverage of vasectomies	22 (13)	7 (4)	3 (2)	1 (1)

Data from previous changes to insurance reimbursement policies suggest that changing the policy itself is not enough to see an effect. Often, we need state and facility-level champions to spread awareness and reduce logistical hurdles [9]. At both institutions in our study, Ob/Gyn faculty gave presentations about the Act to the department prior to survey administration. This policy education may have influenced our study's evaluation of clinician knowledge of the Act to be higher than that of the general clinician population. Information from these presentations may not have been uniformly adopted, or relayed to pediatrics, internal medicine, or family medicine. Our data suggest a need for continued outreach to increase awareness of contraceptive policy changes. A majority of general internal medicine faculty report frequently or often counseling patients about contraception [10]. Involving these clinicians in operationalizing contraceptive policy change may improve access to contraception. Low awareness overall even in academic institutions suggests the importance of messaging to hospital and practice administrators to change practice. Engaging clinicians is a necessary step towards improving public health outcomes.

Our data are limited by our low response rate, which may lead to a skewed representation of clinicians providing contraception in the state. Our sample also overrepresents clinicians working in academic centers and Ob/Gyns and under samples clinicians working in community health centers who provide contraceptive care to many reproductive age women. The survey could not quantify change in primary prescription data, but rather relied on clinician perceptions. Further research regarding trends in contraception prescriptions and LARC access in the state may provide greater understanding of the Act's impact on contraceptive access throughout Maryland.

Funding

This research did not receive any specific grant from funding agencies in the public, commercial, or not-for-profit sectors.

Declarations of interest

Anne Burke reports completed research support from Bayer, pending research support from Scope Intl, and ongoing support from NICHD, all mediated through Johns Hopkins University.

Acknowledgements

The authors would like to acknowledge the Maryland chapter of the American College of Obstetricians and Gynecologists for their gracious help with distributing the survey to their members.

References

- [1] Leeman L. Medical Barriers to Effective Contraception. *Obstet Gynecol Clin North Am* 2007;34(1):19–29.
- [2] Foster DG, Parvataneni R, de Bocanegra HT, Lewis C, Bradberry M, Darney P. Number of oral contraceptive pill packages dispensed, method continuation, and costs. *Obstet Gynecol* 2006;108(5):1107–14.
- [3] Secura GM, Allsworth JE, Madden T, Mullersman JL, Peipert JF. The Contraceptive CHOICE Project: reducing barriers to long-acting reversible contraception. *Am J Obstet Gynecol* 2010;203(2):115 .e1–115.e7.
- [4] Fox J, Barfield W. Decreasing Unintended Pregnancy: opportunities Created by the Affordable Care Act. *JAMA* 2016;316(8):815–16.
- [5] National Women's Law Center. Contraceptive Equity Laws in Your State: know Your Rights - Use Your Rights, A Consumer Guide, Available at: <https://nwlc.org/resources/contraceptive-equity-laws-your-state-know-your-rights-use-your-rights-consumer-guide> 2012. [Accessed August 22, 2019].
- [6] Nathan A. Maryland's Bundle of Joy: a Constitutionally Stronger, More Comprehensive Take on Contraception Coverage. *Am Univ J Gend Soc Policy Law* 2017;25(2):25–9.
- [7] Contraceptive Equity Act, Pub L. No. H.B. 1005, Maryland (May 10, 2016).
- [8] Maryland Medical Assistance Program – Family Planning Services, Pub L. No. S.B. 774, Maryland (May 8, 2018).
- [9] Okoroh EM, Kane DJ, Gee RE, Kieltyka L, Frederiksen BN, Baca KM, et al. Policy change is not enough: engaging provider champions on immediate postpartum contraception. *Am J Obstet Gynecol* 2018;218(6):590 .e1–590.e7.
- [10] Dirksen RR, Shulman B, Teal SB, Huebschmann AG. Contraceptive Counseling by General Internal Medicine Faculty and Residents. *J Womens Health* 2014;23(8):707–13.