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Obstetrician-gynecologists' views on contraception and natural family planning: a national survey

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Abstract

Objective—To characterize beliefs about contraception among obstetrician-gynecologists (Ob/Gyns).

Study design—National mailed survey of 1800 U.S. Ob/Gyns. Criterion variables were whether physicians have a moral or ethical objection to - and whether they would offer – six common contraceptive methods. Covariates included physician demographic and religious characteristics.

Results—1154 of 1760 eligible Ob/Gyns responded (66%). Some Ob/Gyns object to intrauterine devices (4.4% object, 3.6% would not offer), progesterone implants and/or injections (1.7% object, 2.1% would not offer), tubal ligations (1.5% object, 1.5% would not offer), oral contraceptive pills (1.3% object, 1.1% would not offer), condoms (1.3% object, 1.8% would not offer), and the diaphragm or cervical cap with spermicide (1.3% object, 3.3% would not offer). Religious physicians were more likely to object (OR 7.4) and to refuse to provide a contraceptive (OR 1.9).

Conclusion—Controversies about contraception are ongoing, but among Ob/Gyns objections and refusals to provide contraceptives are infrequent.

Keywords

contraception; Natural Family Planning; birth control; ethics; religion

Introduction

May 2010 marked the fiftieth anniversary of the Food and Drug Administration's approval of the oral contraceptive pill. These five decades of use are marked by widespread popularity, with the pill being used at some point by 82% of sexually experienced US women (age 15–44 years).¹ There has also been much controversy, ranging from legal and

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political battles about contraception access,² to concern about the pill's effect on marriage, families, and sexual mores.^{3, 4}

Debates about contraception are by no means limited to the oral contraceptive pill, nor are they limited to the past 50 years, but have spanned many centuries and cultures.^{5, 6} Ongoing loci of controversy are readily found, such as the Bush administration's decision to shift funding away from family-planning programs to abstinence-only education,⁷ or criticism of health insurance providers that provide reimbursements for sildenafil but not for contraceptives.⁸

While contraception has both advocates and opponents, there has been relatively little study of physicians' beliefs about contraception – an important topic since most contraceptive methods must be obtained from a physician. Previously we reported significant variability in obstetrician-gynecologist (Ob/Gyn) physicians' beliefs about emergency contraception and their willingness to offer it.⁹ This study considers contraception more broadly, using survey data to quantify how many Ob/Gyn physicians' object to any of six common contraceptive methods, whether they would provide it if asked, and what they think of Natural Family Planning (the chief alternative to medical or barrier contraception). Because religious issues are prominent in many debates about reproductive medicine,^{10, 11} we also examined associations with physicians' religious characteristics.

Methods

From October 2008 until January 2009, we mailed a confidential self-administered questionnaire to a stratified random sample consisting of 1800 US general Ob/Gyn physicians 65 years old or younger. The sample was generated from the American Medical Association Physician Masterfile, a database intended to include all practicing US physicians. To increase minority representation (especially minority religious perspectives) we used validated surname lists to create four strata.^{12–14} We randomly sampled a) 180 physicians with typical south Asian surnames, b) 225 physicians with typical Arabic surnames, c) 180 physicians with typical Jewish surnames, and d) 1215 other physicians (from all those whose surnames were not on one of these ethnic lists). Physicians received up to three separate mailings of the questionnaire; the first included a \$20 bill, and the third offered an additional \$30 for participating. Physicians also received an advance letter and a postcard reminder after the first questionnaire mailing. All data were double-keyed, cross-compared, and corrected against the original questionnaire. The study was approved by the University of Chicago institutional review board.

Questionnaire

Primary criterion variables were whether the physician has a moral or ethical objection to any of six common contraceptives (oral contraceptive pills, progesterone implants and/or injections, intrauterine devices, diaphragms/cervical cap with spermicide, condoms, or tubal ligation); and whether the physician would offer the method if a patient requested it. Response options were yes or no. Responses were analyzed for each method individually; then to simplify the presentation we pooled all objections into a single variable indicating the physician objected to one or more contraceptive methods.

Inasmuch as many consider Natural Family Planning (the use of cervical mucus and/or basal body temperature assessment to prevent pregnancy) to be the principal alternative to contraception, we hypothesized that physicians who object to contraceptives would have more favorable views toward Natural Family Planning. To assess this we asked a free response question, "Of 100 couples who use Natural Family Planning, how many do you think will get pregnant over a year?" We also asked: As a method of family planning, would

you say that Natural Family Planning is 1) the best option for most women, 2) the best option for some women, or 3) a poor option for most women?

In addition to demographic information, religious characteristics were included as covariates. Religious affiliation was categorized as Non-evangelical Protestant, Evangelical Protestant, Catholic (includes Roman Catholic n=237 and Eastern Orthodox n=25), Muslim, Jewish, Hindu, other religion (includes 9 Buddhists), and no religion. The importance of religion was assessed by asking: How important would you say your religion is in your own life? Response options were dichotomized as “not very important in my life / fairly important in my life” and “very important in my life / the most important part of my life.” Attendance at religious services was categorized as twice a year or less, three times a year to monthly, and twice a month or more. We also asked whether respondents work primarily in an academic medical center or teaching hospital, and whether they are members of the American College of Obstetricians and Gynecologists (ACOG).

Statistical Analysis

Case weights were incorporated to account for the oversampling strategy (the design weight), and to correct for differences in response rates among the surname categories and between US versus foreign medical school graduates (the post-stratification adjustment weight). Weights were the inverse probability of a person with the relevant characteristic being in the final dataset. The final weight for each case/respondent was the product of the design weight and the post-stratification adjustment weight. This method of case weighting – widely used in population-based research¹⁵ – enabled us to adjust for sample stratification and variable response rates in order to generate estimates for the population of U.S. Ob/Gyns. We used the chi-square test to examine the associations between each background variable and physicians’ beliefs about contraception and Natural Family Planning. We then conducted multivariable logistic regression using physicians’ sex, race, region, and age as covariates. When analyzing physicians’ estimates of the Natural Family Planning failure rate, we used ordinary least squares regression analysis. All analyses were conducted using the survey-design-adjusted commands of Stata SE statistical software (version 10.0; Stata Corp., College Station, Tex).

Results

The response rate was 66% (1154/1760), after excluding 40 potential respondents who were retired or had invalid addresses. The response rate varied by sample; 68% (807/1188) of the primary sample responded, 54% (120/221) of those with Arabic surnames responded, 61% (107/175) of those with South Asian surnames responded, and 68% (120/176) of those with Jewish surnames responded. Graduates of foreign medical schools were less likely to respond than graduates of US medical schools (58% vs. 68%, $p=0.001$). These differences were accounted for by calculating post-stratification adjustment case weights. Response did not differ significantly by age, gender, region, or board certification. Demographic characteristics of respondents are reported in Table 1.

Objections to contraception methods

Overall, 4.9% of US Ob/Gyn physicians have a moral or ethical objection to a contraceptive method, and 6.8% would not offer one or more contraceptives if patients requested it. The most common objection was to intrauterine devices (4.4% object, 3.6% would not offer them), followed by progesterone implants and/or injections (1.7% object, 2.1% would not offer them), tubal ligations (1.5% object, 1.5% would not offer them), oral contraceptive pills (1.3% object, 1.1% would not offer them), condoms (1.3% object, 1.8% would not offer them), and the diaphragm or cervical cap with spermicide (1.3% object, 3.3% would

not offer them). (Table 2) Fourteen physicians (1.1%) had a moral or ethical objection to all six contraceptives. Among doctors who would not offer one or more contraceptives (n=79), 52 cited no moral or ethical objections.

A higher percentage of male physicians objected to one or more contraceptive methods, but this trend had borderline significance in the multivariable model (7% vs. 2% of females, OR 2.0, 95% CI 1.0–4.0). Objections did not vary by region, but doctors in western states were less likely to refuse a contraceptive request compared with Southern doctors (4% vs. 9%, OR 0.4, 95% CI 0.2–0.9). (Table 3)

Religious physicians were more likely to have objections and to refuse to provide some contraceptives. Compared with doctors who attend services twice a year or less, those who attend twice a month or more were more likely to object to a contraceptive method (43% vs. 5%, OR 7.4, 95% CI 2.5–22). These frequent attenders were also slightly more likely to refuse to provide a contraceptive method (9% vs. 5%, OR 1.9, 95% CI 1.0–3.7). (Table 3)

Doctors who object to one or more contraceptives were less likely to work in academic medical centers (6% vs. 26%, OR 0.3, 95% CI 0.1–0.7), and less likely to belong to ACOG (78% vs. 93%, OR 0.3, 95% CI 0.1–0.8), compared to doctors without objections. Similarly, doctors who would refuse to provide one or more contraceptives were less likely to work in academic medical centers (12% vs. 26%, OR 0.5, 95% CI 0.2–0.9) and were less likely to be ACOG members (83% vs. 93%, OR 0.4, 95% CI 0.2–0.9), compared to doctors who would offer all requested contraceptives. (Multivariable analyses included gender, race, age, region, religious affiliation, importance of religion, and attendance at services.)

Natural Family Planning

When asked to estimate the yearly pregnancy rate among couples practicing Natural Family Planning, the average estimate was 25%, the standard deviation was 18%, and the range was 0–100%. In an ordinary least squares regression analysis that included physician sex, region, race, age, religious affiliation, importance of religion, and attendance at services, Catholic doctors gave estimates that were 3.4 percentage points lower ($p=0.03$, 95% CI -6.4 to -0.3), and doctors affiliated with some “other religion” gave estimates 5.4 percentage points lower ($p=0.006$, 95% CI -9.3 to -1.6) than non-Evangelical Protestants. Estimates were not correlated with physicians’ attendance at religious services, or the importance of religion in their lives. Adding doctors’ objections to the model, we found that doctors who object to one or more contraceptives gave estimates that were 5.9 percentage points lower ($p=0.005$, 95% CI -10.0 to -1.8) than estimates provided by doctors without objections.

A majority of physicians (68%, n=794) consider Natural Family Planning to be a poor option for most women. A third believe it is the best option for some women (31%, n=342), while few believe it is the best option for most women (1%, n=9). Physicians’ assessments varied with religious characteristics. Whereas 72% of non-evangelical Protestants considered it a poor option (referent), the belief was less common among Evangelical Protestants (60%, OR 0.6, 95% CI 0.3–0.9) and Catholics (56%, OR 0.5, 95% CI 0.3–0.7). (Table 4)

Comment

In this national survey we found that Ob-Gyn physicians generally support the use of contraception, but some (4.9%) have ethical reservations about specific contraceptive methods, and some (6.8%) would refuse to provide specific contraceptives. We also found that estimates of the Natural Family Planning failure rate are quite variable, with most physicians considering Natural Family Planning a poor option for most women.

Many prior studies have noted that physician gender is an important factor in reproductive healthcare decisions; but identifying precisely how and when gender differences manifest themselves clinically is an active research field.^{16–18} Previously we reported that males and females have different views about emergency contraception (males are more likely to say it increases sexual risk factors, and are less likely to offer it).⁹ However in the present study we found little difference between male and female physicians' views on contraception and Natural Family Planning.

A variety of explanations may be proposed for why religious physicians are more likely to oppose contraception, and to look more favorably on Natural Family Planning. The Catholic Church, in *Humanae Vitae*, argued for an “inseparable connection... which man on his own initiative may not break, between the unitive significance and the procreative significance which are both inherent to the marriage act.”¹⁹ Some contraceptives, especially the intrauterine device, continue to be criticized in conservative circles for potentially blocking implantation and causing destruction of the conceptus;²⁰ although leading textbooks deny that the IUD is abortifacient.²¹ Additionally, theologians such as Meilaender and Turner are among those who link widespread contraception use with negative effects on sexual mores; arguing that “sex has become increasingly a form of play (which we then try vainly to convince our children they are not ready for)” and has “played havoc with the public meaning of marriage” (24).²²

Some have supposed that recent opposition to contraceptives is an outgrowth of the anti-abortion movement.²³ That conservative groups would oppose both abortion and contraception is a source of frustration for some policy makers who believe that contraceptive use prevents abortions.²⁴ Indeed, some have argued that pro-life advocates “can't have it both ways – if they're going to oppose abortion, they have to support contraception.”²⁵ However, the historian McLaren has argued that the distinction between contraception and abortion is a recent phenomenon.⁶ For instance, the influential Renaissance writer Erasmus claimed “there is very little difference between one who cuts short what has begun to be born and one who sees to it that there can be no birth.” (100)²⁶

While religious physicians were more likely to object to and withhold some contraceptives, not all religious physicians took this approach. For instance, among Catholic physicians—who belong to an organization which teaches that all birth control except Natural Family Planning is “intrinsically evil” (2370)²⁷—a large percentage had no objections and would provide birth control if requested. This parallels other reports; for instance Catholic clients were overrepresented at early birth control clinics (234),⁶ and recent Catholic polls show that 63% of US Catholics believe church teachings on condoms should change.²⁸ People who endorse a particular religious affiliation do not necessarily endorse all of that religion's teachings.

Most physicians, even those with objections, would offer a contraceptive method if a patient requested it. This is consistent with ACOG's position that all patients should have access to all legal and standard treatment options.²⁹ It is important to note that most physicians who would deny a contraceptive request did not do so because of a moral or ethical objection. This suggests that while ethical views are important, other concerns - perhaps involving efficacy, compliance, or familiarity - make important contributions to Ob/Gyns' willingness to provide specific contraceptives.

Physicians vary widely in their estimates of Natural Family Planning's failure rate, which is not surprising since the literature itself varies widely on this topic. One recent cohort study reported an unintended pregnancy rate of 0.6 per 100 women over 13 cycles when there was no unprotected intercourse during fertile times.³⁰ A multi-site international study focusing

on the “standard days method” found a typical-use pregnancy rate of 14.1 per 100 women-years.³¹ The Center for Disease Control lists the annual failure rate from 1–25%.³² Estimates are complicated by the method’s inherent reliance on sustained patient motivation, which affects both enrollment and retention in trials. Our finding, that physicians generally have a negative assessment of Natural Family Planning, is consistent with a previous study reporting that doctors have strong biases against the method.³¹ That study also reported that clinicians’ views softened as they gained knowledge about and familiarity with the method, such that the percentage recommending against “fertility awareness based methods” decreased from 25% to 2%.³¹ Perhaps religious physicians’ support for Natural Family Planning may be attributed as much to familiarity as to religious motivations.

This study has limitations. We surveyed only Ob/Gyn physicians, so cannot compare their beliefs and actions with those of other physicians. Our analysis found many correlations, but the cross-sectional design cannot demonstrate causation. The response rate was strong, but it is possible that non-respondents differed from respondents in ways that biased the findings. Finally, self-reports are imperfect indicators of physicians’ beliefs and practices.

Conclusion

The history of contraception is filled with controversy, but in our study only a small minority of Ob/Gyn physicians objected to one or more common contraceptive methods, or would refuse to offer a contraceptive method requested by a patient. Frequently, when one method was problematic there were alternatives the doctor was willing to offer. Religious physicians were more likely to consider Natural Family Planning a reasonable option. While controversy about contraception has by no means disappeared, it does not appear to be a significant source of division among Ob/Gyn physicians in the United States.

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Table 1

Respondent demographics

	N	%
Gender		
Female	537	47
Male	617	53
Race		
White, non-Hispanic	774	69
Black, non-Hispanic	67	6
Asian	202	18
Hispanic/Latino	64	6
Other	22	2
Age		
25–40	291	25
41–47	305	26
48–55	281	24
56–65	277	24
Region		
South	373	32
Midwest	249	22
Northeast	288	25
West	242	21
Medical Education		
US medical graduate	932	81
International medical graduate	222	19
Religious affiliation		
Non-evangelical Protestant	300	27
Evangelical Protestant	91	8
Catholic	262	23
Muslim	54	5
Jewish	160	14
Hindu	91	8
Other religion	48	4
No religion	119	11
Importance of religion		
Not very important	272	24
Fairly important	321	28
Very important	385	34
The most important part	157	14
Attendance at services		

	N	%
2 per year or less	380	33
3x per year to monthly	290	26
Twice a month or more	466	41
Practice characteristics		
ACOG member	1052	92
Work primarily in academic center	305	27

Percentages are not survey design adjusted. Results may not sum to 100 due to rounding error.

Age for total sample: mean 47.8, standard deviation 9.2, range 26–65

Table 2

Ob/Gyn physicians' beliefs and practices regarding contraception

Contraceptive Method	Physicians have a moral or ethical objection to contraceptive method		Physicians would not offer contraceptive method	
	N	%*	N	%*
Oral contraceptive pills	16	1.3	11	1.1
Progesterone implants and/or injections	19	1.7	25	2.1
Intrauterine devices	46	4.4	36	3.6
Diaphragms/cervical cap with spermicide	16	1.3	41	3.3
Condoms	18	1.3	18	1.8
Tubal ligation	20	1.5	17	1.5

* Percentages are survey design adjusted and reflect estimates of the population of all US Ob/Gyn physicians.

Table 3

Ob/Gyn physicians' objections and unwillingness to offer a contraceptive, by gender, region, and religious characteristics

	MD objects to one or more contraceptive methods			MD would not offer one or more contraceptive methods				
	%	N	P*	OR(95%CI) †	%	N	P*	OR ‡
Gender								
Female	2	12	.001	1.0 referent	5	28	.05	1.0 referent
Male	7	42		2.0(1.0-4.0)	8	51		1.4(.8-2.5)
Region								
South	6	23	.1	1.0 referent	9	36	.06	1.0 referent
Midwest	5	12		.9(.4-2.1)	6	17		.6(.3-1.3)
Northeast	2	8		.4(.1-1.1)	5	15		.6(.3-1.2)
West	5	9		1.0(.4-2.2)	4	9		.4(.2-.9)
Religious affiliation								
Non-evangelical Protestant	5	15	.005	1.0 referent	6	19	.4	1.0 referent
Evangelical Protestant	10	9		1.6(.7-4.0)	11	10		1.5(.7-3.5)
Catholic	7	20		1.3(.6-2.8)	8	23		1.2(.6-2.4)
Muslim	2	1		.4(.05-3.4)	2	1		.2(.03-2.0)
Jewish	1	4		.2(.07-.7)	4	8		.6(.2-1.5)
Hindu	2	2		.6(.08-4.8)	5	6		.9(.2-3.4)
Other religion	4	2		.9(.1-5.4)	10	5		2.2(.7-7.1)
No religion	1	1		.2(.02-1.5)	5	5		.8(.3-2.2)
Importance of religion								
Not/fairly important	2	9	<.001	1.0 referent	5	34	.1	1.0 referent
Very/most important	9	45		6.0(2.5-14)	8	44		1.4(.8-2.5)
Attendance at services								
2 per year or less	1	5	<.001	1.0 referent	5	19	.06	1.0 referent
3x per year to monthly	2	6		1.5(.4-6.0)	6	17		1.1(.5-2.6)
Twice a month or more	9	43		7.4(2.5-22)	9	42		1.9(1.0-3.7)

Percentages reflect survey-design adjusted estimates of all US Ob-Gyn physicians.

* P values reflect the bivariate associations between background characteristics and objections/unwillingness to offer specific contraceptives.

† Multivariable odds ratios include gender, race, age, and region. For gender and region the analysis also includes religious affiliation, importance of religion, and attendance at services.

Table 4

Ob/Gyn physicians' beliefs about Natural Family Planning, by gender, region, objections to contraception, and religious characteristics.

	Physician believes Natural Family Planning is a poor option for most women		
	N(%)	p*	OR(95%CI) [†]
Gender			
Female	372(69)	.9	1.0 referent
Male	422(68)		1.0(.7–1.4)
Region			
South	253(69)	.6	1.0 referent
Midwest	165(65)		.9(.6–1.4)
Northeast	202(69)		1.0(.7–1.6)
West	172(71)		1.0(.7–1.6)
Objection to contraception			
No moral/ethical objection	763(69)	.03	1.0 referent
Objects to one or more contraceptives	30(54)		.7(.3–1.3)
Religious affiliation			
Non-evangelical Protestant	217(72)	<.001	1.0 referent
Evangelical Protestant	53(60)		.6(.3–.9)
Catholic	145(56)		.5(.3–.7)
Muslim	36(64)		.6(.3–1.5)
Jewish	122(81)		1.7(.96–2.9)
Hindu	67(63)		.8(.3–1.9)
Other religion	37(78)		1.5(.6–3.5)
No religion	97(81)		1.5(.8–2.7)
Importance of religion			
Not/fairly	436(74)	<.001	1.0 referent
Very/most	343(62)		.6(.4–.8)
Attendance			
2 per year or less	301(81)	<.001	1.0 referent
3x per year to monthly	186(63)		.4(.3–.6)
Twice a month or more	297(62)		.4(.3–.6)

Percentages reflect survey-design adjusted estimates of all US Ob-Gyn physicians.

* P values reflect the bivariate associations between background characteristics and objections/unwillingness to offer specific contraceptives.

[†] Multivariable odds ratios include gender, race, age, and region. For gender, region, and “objections to contraception” the analysis also includes religious affiliation, importance of religion, and attendance at services.