

A Cross-sectional Study to Assess Contraceptive Awareness and Practices among Married Women of Reproductive Age Group in a Tertiary Care Institute

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ABSTRACT

Aim: To analyze the acceptance and use of various contraceptives and to determine the reasons behind the unmet need for contraception.

Materials and methods: We conducted a cross-sectional observational study among 300 married women of reproductive age group over a period of 2 months. Age, education, use, and experience of contraception in the past and a few questions to assess their knowledge and acceptance toward contraceptive methods were asked.

Results: Awareness regarding contraception among these women was 97.3%, but the use was only 44%. Maximum women were using condoms, 20%; followed by Copper-T, 8%; oral contraceptives, 7%; and injectable contraception, 1%. The most common reason for not using contraception was lack of guidance 15%, followed by misconceptions regarding contraception 13.3 and 6% due to family pressure. Out of 300, 19.3% of women had misconceptions regarding Copper-T, 9.7% of them regarding oral contraceptives, 1.3% regarding condoms, and 1% regarding tubal ligation. A total of 84.3% of women had received an education at primary, secondary, or graduate level and 15.7% were uneducated. The most common source of knowledge regarding contraception was through media 36%, followed by 31.3% from healthcare workers and family members. Out of 300 women, 10.3% had unwanted pregnancies and 8% had undergone abortion. After counseling and guidance 61.3% of women were willing to use contraception in the future.

Conclusion: We concluded that even though many women were aware of contraception, very few were actually using it and proper guidance and refuting misconceptions can help to increase this number.

Clinical significance: Family planning is an effective tool for population stabilization and as an intervention to improve maternal and child health. Effective use of contraception can help to prevent unwanted pregnancies and unsafe abortions. It has been estimated that meeting women's needs for contraceptives would prevent one-quarter to one-third of all maternal deaths.

Keywords: Awareness, Contraception, Practices.

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INTRODUCTION

India was the first country in the world to adopt a population policy and launch a national program for family planning back in 1952.¹ The initial efforts under the program were aimed at population stabilization, but now it is well recognized as an intervention to improve maternal and child health. Most fundamentally, family planning advances human rights by helping couples decide freely and for themselves, whether, when, and how many children they want to have.²

Maternal mortality ratio of India as per the report of the Sample Registration System (SRS) data 2018–2020 is 97/1,00,000 live births.³ About 8% of maternal deaths globally are attributed to unsafe abortions.⁴ Effective use of contraception can help to prevent unwanted pregnancies and unsafe abortions. It has been estimated that meeting women's needs for modern contraceptives would prevent about one quarter to one-third of all maternal deaths.⁵

AIM AND OBJECTIVE

- To analyze the acceptance and extent of use of various contraceptives among married women of 18–45 years age group.

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- To determine the reasons behind the unmet need of contraception among these women and to devise a solution for the problem.

MATERIALS AND METHODS

A cross-sectional observational study was conducted over a period of 2 months including married women of 18–45 years of age coming to antenatal, family planning or gynecology

Table 1: Awareness and use of various methods of contraception

	ANC (N = 100)	PNC (N = 100)	GYN/FP (N = 100)	Total (N = 300)
Number and percentage of aware about at least 1 method of contraception	99 (99%)	99 (99%)	94 (94%)	292 (97.3%)
Number and percentage of women used contraception in the past	35 (35%)	41 (41%)	56 (56%)	132 (44%)
Number and percentage of women willing to use contraception in the future	72 (72%)	62 (62%)	50 (50%)	184 (61.3%)
<i>Method of contraception used</i>				
Condom	20 (20%)	26 (26%)	14 (14%)	60 (20%)
Copper-T	4 (4%)	6 (6%)	14 (14%)	24 (8%)
OCPs	9 (9%)	5 (5%)	7 (7%)	21 (7%)
Tubectomy	0	2 (2%)	16 (16%)	18 (6%)
DMPA	0	1 (1%)	2 (2%)	3 (1%)
Withdrawal	2 (2%)	1 (1%)	3 (3%)	6 (2%)

ANC, antenatal care; GYN/FP, gynecology/family planning; PNC, postnatal care

Table 2: Reasons for not using contraception

	No knowledge	No guidance	Misconceptions regarding side effects	Unbearable side effects in past	Family pressure	Religious reasons	Others
ANC (N = 100)	5 (5%)	17 (17%)	13 (13%)	2 (2%)	10 (10%)	4 (4%)	14 (14%)
PNC (N = 100)	4 (4%)	15 (15%)	13 (13%)	1 (1%)	4 (4%)	6 (6%)	16 (16%)
FP/GYN (N = 100)	2 (2%)	13 (13%)	14 (14%)	0	4 (4%)	5 (5%)	6 (6%)
Total (N = 300)	11 (3.7%)	45 (15%)	40 (13.3%)	3 (1%)	18 (6%)	15 (5%)	36 (12%)

ANC, antenatal care; PNC, postnatal care

Table 3: Misconceptions regarding contraception (N = 300)

Contraception	Misconceptions
<i>Copper-T</i>	<i>Menorrhagia</i>
58 (19.3%)	27 (9%)
<i>OCP/Mala D/Mala N</i>	<i>Weight gain/obesity</i>
29 (9.7%)	14 (4.7%)
<i>Condom</i>	<i>Infection</i>
4 (1.3%)	3 (1%)
<i>Tubectomy</i>	<i>Back ache</i>
3 (1%)	2 (0.7%)
	<i>Pain</i>
	20 (6.7%)
	<i>Rupture/perforation</i>
	11 (3.6%)
	<i>Future infertility</i>
	11 (3.7%)
	<i>Allergy</i>
	1 (0.3%)
	<i>Death</i>
	1 (0.3%)
	<i>Menstrual irregularity</i>
	4 (1.3%)

out-patient department or admitted to antenatal, postnatal or gynecology ward of our institute. After attaining permission from our Institutional Ethics Committee, various data of patients such as their age, years of marriage, use and experience of contraception in the past was documented and a few questions to assess their knowledge and acceptance toward various contraceptive methods were asked. Factors affecting their current contraception use and misconceptions if any were analyzed. All collected data are presented in tabular form. Charts and tables were prepared using Microsoft (MS) Word and MS Excel. Categorical data has been represented as percentages.

RESULTS

It was observed that from the total age group of 18 to 45 years, maximum women (36.7%) belonged to the age group of 26–30 years followed by 31.3% in the age group of 18–25 years. Table 1 shows awareness and use of various methods of contraception among these 300 women. Total of 97.3% women were aware about

at least one method of contraception but only 44% were actually using some contraception. Maximum couples were using condom (20%), followed by Copper-T (8%), oral contraceptive pills (OCPs, 7%), injectable hormonal contraception [depo-medroxy progesterone acetate (DMPA), 1 and 6%] had undergone tubal ligation. Table 2 shows reasons that these women had for not using contraception. Maximum women, 15% were not using contraception due to lack of proper guidance followed by 13.3% due to misconceptions regarding contraception, 6% due to family pressure, 5% due to religious reasons and rest due to either wanting to conceive, lack of knowledge or unbearable side effects. Misconceptions regarding contraceptive methods are depicted in Table 3 where 19.3% women had misconceptions regarding Copper-T, 9.7% regarding OCPs, 1.3% regarding condom, and 1% regarding tubal ligation. Among women denying Copper-T most women feared menorrhagia (9%), followed by pain (6.7%), and uterine perforation (3.6%). Among women with misconceptions regarding OCPs, 4.7% were concerned regarding weight gain, 3.7% regarding future infertility, and 1.3% thought OCPs cause menstrual irregularity. One percent of the women

Table 4: Association of education and use of contraception

Education	ANC (N = 100)		PNC (N = 100)		GYN/FP (N = 100)		Total (N = 300)	
	Total	Using contraception	Total	Using contraception	Total	Using contraception	Education	Using contraception
Uneducated	7 (7%)	2 (2%)	11 (11%)	1 (1%)	29 (29%)	18 (18%)	47 (15.7%)	21 (7%)
Up to middle school	53 (53%)	20 (20%)	49 (49%)	20 (20%)	43 (43%)	24 (24%)	145 (48.3%)	64 (21.3%)
High school	28 (28%)	6 (6%)	17 (17%)	7 (7%)	13 (13%)	6 (6%)	58 (19.3%)	19 (6.3%)
Graduate	12 (12%)	7 (7%)	23 (23%)	13 (13%)	15 (15%)	8 (8%)	50 (16.7%)	28 (9.4%)
Total	100	35 (35%)	100	41 (41%)	100	56 (56%)	300	132 (44%)

ANC, antenatal care; GYN/FP, gynecology/family planning; PNC, postnatal care

Table 5: Accidental pregnancies due to lack of contraception

	Number and percentage continued	Number and percentage aborted	Total
ANC (N = 100)	3 (3%)	5 (5%)	8 (8%)
PNC (N = 100)	1 (1%)	8 (8%)	9 (9%)
FP/GYN (N = 100)	3 (3%)	11 (11%)	14 (14%)
Total (N = 300)	7 (2.3%)	24 (8%)	31 (10.3%)

ANC, antenatal care; PNC, postnatal care

thought condoms caused infections instead of preventing them and 0.3% of them feared allergy to condoms. One percent of the women feared backache or even death due to tubal ligation. Table 4 shows association between education and use of contraception. Out of 15.7% women who were uneducated, 7% were using contraception, and among rest of the 84.3% women who had received either primary, secondary, or graduate level education, 37% were using contraception. Table 5 shows percentage of accidental pregnancies due to lack of contraception and outcome of these pregnancies. Out of 10.3% women who had accidental pregnancies, 8% underwent abortion, and only 2.3% continued with the pregnancy.

DISCUSSION

Most women of reproductive age group know little or incorrect information about family planning methods. Even when they know some names of contraceptives, they do not know where to get them or how to use it.⁶ This lack of guidance is a major reason for lack of use of contraceptive methods. In our study it was observed that 97.3% women were aware about at least one method of contraception but only 44% had used some method of contraception. This observation was in line with another study conducted by Upadhye and Upadhye in urban Indian population where they observed that although awareness regarding contraception was 92.5% only 42.5% were using contraception.⁷ Berry and Kumar observed that in their study population in Himachal Pradesh 84% women were aware about contraception but only 51% were using it.⁵ Similar study conducted in Nepal showed that 92.3% women were aware of contraception, 70.8% had used it in the past, and 64.6% were using it currently.⁸

In our study, we observed that most couples had used condom 20% as a method of contraception, followed by 8% of Copper-T, 7% of OCPs, 2% of withdrawal, and only 1% had used DMPA. Six percent of women had undergone tubal ligation. Upadhye and Upadhye⁷ also observed that 20% couples had used condoms as contraception followed by Copper-T, 7.5%; OCPs, 1.5%; DMPA, 0.5%; and 12.5% had undergone tubal ligation. In a study conducted in

Nagpur by Ghike et al.⁹ Copper-T was found to be the most common method of contraception 22.7%, followed by DMPA 6.5%, condom 5.4%, and OCPs 2.1%. In studies conducted in Nepal and Ethiopia, DMPA was the more common choice of contraception, 92.7 and 77.2%, respectively. The use of OCPs in these countries was 91.7 and 7.4%, respectively, and that of condom was 89.6% in the study conducted in Nepal.^{6,8}

It was observed that almost all women were aware about contraception but they were hesitant to discuss it with their husbands or family members or approach healthcare workers for the same. As a result, the most common reason for not using contraception was found to be lack of proper guidance 15% followed by misconceptions regarding contraception 13.3%. Six percent women refused contraception due to family pressure and 5% due to religious reasons. Only 3.7% women did not use contraception due to lack of knowledge and only 1% reported unbearable side effects in the past. The rest 12% women wished to conceive and therefore were not using contraception. In the study conducted by Upadhye and Upadhye⁷ it was seen that 52.5% women not using contraception did not have any reason to not use it, 25% patients had some myths regarding their side effects and 22.5% women were not using contraception due to family pressure. In the study conducted by Ghike et al.,⁹ 59% women did not use contraception due to family pressure whereas 3.3% considered children to be God's gifts and therefore did not wish to use contraception to limit children. Berry and Kumar⁵ observed that 45% women did not use contraception due to unbearable side effects, 29% because they feared that it would cause future infertility, 55% were not using due to family pressure, and 3% due to religious reasons. Eighteen percent of the women desired children. In the study conducted in Nepal, 48.3% women thought that contraception would damage the uterus, 41.7% feared side effects, and 36.7% thought that contraception will cause future infertility.⁸ When asked in detail, we observed that among women denying Copper-T, most women feared menorrhagia (9%), followed by pain (6.7%), and uterine perforation (3.6%) but none of them had ever experienced these symptoms or side effects. Among women with misconceptions regarding OCPs, 4.7% were concerned regarding weight gain, 3.7% regarding future infertility, and 1.3% thought OCPs cause menstrual irregularity. One percent of women thought condoms caused infections instead of preventing them and 0.3% feared allergy to condoms. One percent of women feared backache or even death due to tubal ligation.

Out of the 44% women who were using contraception, maximum 21.3% were using it for spacing between children followed by 12% for limiting family size and 9% to delay birth of

first child. Similar results were seen in the study conducted in Nepal where 71.5% women were using contraception for spacing and 68.9% to limit family size.⁸

From the total age group of 18 to 45 years, maximum women in our study belonged to age group of 26–30 years 36.7% followed by 31.3% in age group of 18–25 years. Similar results were seen in studies by Upadhye and Upadhye,⁷ where 43.5% women belonged to age of 26–30 years whereas in the study by Berry and Kumar 51% belonged to age group of 26–35 years. Out of 84.3% women who had received either primary, secondary, or graduate level education, only 37% were using contraception. In the 15.7% women, who were uneducated (7%), were using contraception. In the study conducted by Upadhye and Upadhye,⁷ the literacy rate was 100% but still use of contraception was only 42.5%. Interestingly, in a study conducted in Ethiopia, 47% of the women in the study were illiterate but 50.4% of them were currently using some method of contraception and a total of 75.3% had used some method of contraception in the past. This shows that counselling the women and their families the importance of contraception, addressing their misconceptions and fears and guiding them as to the proper use of contraception plays a far more significant role than just education.

The most common source of information regarding contraception was found to be the various forms of media, the radio, television, and posters in health centers 36%. This was followed by 31.3% from healthcare workers and family members each. Both studies conducted by Upadhye and Upadhye⁷ and Ghike et al.⁹ found media to be the most common source of information regarding contraception at 37.5 and 70%, respectively.

In the study conducted in Nepal, 79.3% of the women were using contraception to avoid unwanted pregnancies.¹⁰ In our study, we found that 10.3% of the women had unwanted pregnancies, 8% of these were aborted, and only 2.3% carried to term. Such abortions if carried out by unsafe method can be potentially life threatening to these women. Carrying an unwanted pregnancy to term not only becomes a mental and physical burden to the woman but also a financial burden to the family and society at large.¹¹

As a part of our study, we asked the women whether they thought knowledge regarding contraception was necessary and who should be responsible for contraception, just the wife, the husband or both? Ninety six percent women said that knowledge regarding contraception is necessary but 4% were still of the opinion that it was not necessary. In response to the second question, 90.3% women thought that both husband and wife should be responsible for contraception whereas 7.7% were of the opinion that women should be responsible for contraception. One percent thought that only the husband should be responsible for contraception whereas 1% did not feel the need for either the husband or the wife to be responsible for contraceptive use.

CONCLUSION

After detailed discussions with these women regarding contraception we realized that the decision to use a contraceptive method was greatly influenced not only by the husband but also by the husband's family and religious beliefs. Although the use of condom was maximum, it is a form of contraception in which the woman is dependent on the man for its use and therefore has less control over it being used as an effective method. Not a single woman had used a female condom, which they can actually use without being dependent on their male counterparts. This shows the lack

of knowledge and initiative to take responsibility for contraception irrespective of the husband and his family. To remedy this situation, we as medical professionals should ensure that we give adequate time to our patients, their husbands and preferably mother-in-law to counsel them regarding various methods of contraception, their availability, their possible side effects and their effect on future fertility. Couples should be counselled regarding prevention of unwanted pregnancies to avoid the risk and complications of abortions. Efforts should be taken to approach these couples in the reproductive age group at their homes rather than to wait for them to approach the healthcare system for contraception. School education should include this topic in their health education discussions to promote awareness regarding contraception and safe sex practices. Even in our study after talking to these women and addressing their concerns about contraception, 61% were willing to take up some form of contraception in the future out of which 27% wanted temporary contraception and 34% wanted permanent contraception as their family was complete. This comes to show that just talking to these women about contraception, guiding them and solving their doubts can go a long way in improving the acceptance of contraception in our society.

Clinical Significance

Family planning is one of the pillars of safe motherhood and reproductive rights.⁸ Proper use of family planning services can have a positive impact on population growth, maternal mortality and infant and new-born outcomes.¹⁰ Counselling the women and their families the importance of contraception, addressing their misconceptions and fears and guiding them as to the availability and proper use of contraception plays a far more significant role in increasing the use of contraception than just education.

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