

KNOWLEDGE, ATTITUDE AND PRACTICES OF CONTRACEPTION IN WOMEN OF REPRODUCTIVE AGE

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ABSTRACT

Background: Pakistan is the 6th most populous country of the world while contraceptive prevalence rate is only 30%. This study was conducted to investigate the knowledge, attitude and practices of contraception in women of reproductive age.

Material & Methods: This descriptive cross-sectional survey was carried out from January to June 2011, at Gynae/Obs Unit, Women & Children Hospital, Kohat. A convenient sample of 900 was selected from reproductive age group (15-49 years), attending the outdoor. Data was collected on a questionnaire. Likert 3 point and 5 point scale was used about the knowledge and attitude of contraceptive respectively. SPSS version 16 and Statistic 9 were used to analyze the data.

Results: The mean age of respondents was 30.76 ± 7.641 years. The mean age at marriage was 18.19 ± 2.982 years, literacy rate 37.8%, 95.2% women were house wives and 56.2% respondents had heard of some method. While enquiring their own attitude, 589(65.4%) gave positive response regarding the use of contraceptives and 734(81.6%) declared family planning as prohibited in the religion. Use of contraceptive was (30.8%). However, it was more common in grand multipara $p < 0.0001$, >35 years old ladies $p < 0.0001$, working women $p < 0.01$ and those with education up to matric and above $p < 0.001$. Husband education did not show significant difference on contraceptive use $p = 0.162$.

Conclusion: Frequency of contraceptive use is comparatively low in our set-up despite high level of awareness. Desire for larger family, pressure from husband, religious concerns and fear of side effects are the main factors responsible.

KEY WORDS: Contraception, Reproductive age, Contraceptive prevalence rate.

INTRODUCTION

Of the world population, 75% live in developing countries characterized by high fertility rates, high maternal and infant mortality and low life expectancy.¹ According to the Population Reference Bureau 2010. Pakistan is the 6th most populous country of the world. Total world population is 6.9 billions and the estimated population of Pakistan is 185 million and is expected to be 335 million in the year 2050 and Pakistan will rank the 4th largest nation of the world. Still it is facing hurdles with the control of fast growing population. So this is impossible for the developing country like Pakistan to keep pace between growing population and limited resources. Fourteen percent of the total Pakistan population (25.9 million) is living in Khyber Pakhtoonkhwa province with total fertility rate of 4.33.² Kohat is a medium sized town in this province. In 1901 the population was 217,865, showing an increase of 11% in the de-

cade. According to data from Pakistan's last census in 1998, the district's population stands around 562,640 with an annual growth rate of 3.25% and now it is more than 0.8 million.^{3,4}

For a large and rapidly growing population an effective family planning program is needed. A large number of family planning centers are working in the country; millions of rupees have been spent on family planning services but with no major achievement. Contraceptive prevalence rate (CPR-which is the proportion of women of reproductive age (15-49 years) who are using or whose partner are using a contraceptive method at a given point in time) is 30% which was 29% in 2009 and 2008 while the most developed country like USA has 71% CPR for all the methods.^{1,5-7}

Worldwide the fertility rate (the total number of children the average woman in a population is likely to have based on current birth rates throughout her life)⁵ have fallen largely due to the wide-

spread and increasing use of modern methods of contraception. However, in some developing countries like Pakistan the uptake of contraception remains low due to cultural, economical and political barriers. After nearly five decades of government-initiated family planning programs,⁸ the increase in contraceptive prevalence rate in Pakistan is slow. The use of modern methods is only 22%. While the average CPR of Asia is 66%.¹

Total fertility rate in Pakistan ranges from 4.1 to 5.49 and life expectancy is 66 years while the total fertility rate of Asia is 2.2 and life expectancy 70 years.¹ Though the total fertility has decreased in Pakistan but still it has the highest rate in south Asia. To understand this problem, research is needed to investigate the social, religious and cultural aspects of females. The major myth regarding contraception is that it causes harm to womb and causes sterility.^{9,10} Also people are not aware regarding the emergency contraceptive, therefore the well documented link between female education and use of contraception plays an important role in the development of family planning policies in lower income countries. Female education and autonomy as well as husband education put a direct impact on the contraceptive prevalence rate.¹¹⁻¹²

The aim of this study was to find out the knowledge, attitude and practices of contraception in the women of reproductive age group. The secondary outcome measures were, to compare it according to the age, parity, occupation and educational status of the women as well as educational status of their spouses.

MATERIAL AND METHODS

This descriptive cross-sectional survey has been carried out from January 2011 to June 2011 in the out door patients department (OPD) of Gynae and Obstetric Unit of Women and Children/ Liaquat Memorial Hospital Kohat. A non-probability convenience sample of 900 was selected from reproductive age (15-49 years) group, attending the OPD either as patients or their attendants for this survey. Data was collected, after obtaining consent, on a predesigned questionnaire (duly approved by research and ethical committee of KUST Institute of Medical Sciences) containing sociodemographic details, reproductive profile, use of contraception and any concern about the use like religion, side effects and lack of autonomy, etc.

Reasons for non-utilization of contraceptive were also asked from the respondent. Likert 3 point and 5 point scale¹⁴ was used about the knowledge and attitude of contraceptive respectively. A group of 4 nurses were trained for data collection and it was completed in six months.

Table 1: Socio demographic characteristics.

Age group in years	Frequency	Percentage
<20	86	9.55
20-25	195	21.66
26-30	235	26.11
31-35	163	18.11
>35	221	24.55
Total	900	100
Occupation		
House wives	857	95.2
Office goings	31	3.4
Servants (working in other houses)	12	1.3
Educational status (wife)		
Uneducated	560	62.2
Below Matric	185	20.6
Matric	78	8.7
Intermediate	31	3.4
Bachelor	28	3.1
Master /Professional / Postgraduate	18	2.0
Educational status (husband)		
Uneducated	268	29.8
Below Matric	215	23.9
Matric	223	24.8
Intermediate	88	9.8
Bachelor	54	6.0
Master /Professional / Postgraduate	52	5.8
Parity		
<2	266	29.6
2-5	447	49.7
>5	187	20.8

Table 2: Attitude towards the use of contraceptives.

Opinion	Frequency	Percentage
Strongly agree	153	17.0
Agree	436	48.4
No idea	155	17.2
Disagree	98	10.9
Strongly disagree	58	6.4
Total	900	100

Data was analyzed by SPSS version 16. Descriptive statistics were run based on respondent's socio-demographic characteristics, reproductive profile and contraceptive knowledge, attitude and practices. Odds ratios were calculated to find the strength of relationship between contraceptive practice and, age, parity, occupation and education of the respondents as well as their husband's education, while chi-square test was used to find

the significance of proportions of contraceptive practiced. A p-value of 0.05 was considered significant for inference.

RESULTS

Among 900 women of reproductive age group (15-49 years), about half (47.8%) of the respondents were in the age group 20-30 years. The socio-demographic characteristics of res-

Table 3: Cross tabulation of contraceptive practices to age, parity, occupation and educational status of women and their husbands.

Variable	Range/level	Contraception practicing	Contraception not practicing	Total
Age in years	<20	11	75	86
	20-25	38	157	195
	26-30	71	164	235
	31-35	60	103	163
	>35	97	124	221
	Total		277	623
Parity	<2	29	237	266
	2-5	161	286	447
	>5	87	100	187
	Total	277	623	900
Occupation	House wives	256	601	857
	Servants (working with others)	6	6	12
	Office goings	15	16	31
	Total	277	623	900
Educational status	Uneducated	152	408	560
	Below Matric	60	125	185
	Matric	33	45	78
	Intermediate	12	19	31
	Bachelor	11	17	28
	Master /post graduate / professionals	9	9	18
	Total	277	623	900
Husband educational status	Uneducated	72	196	268
	Below Matric	67	148	215
	Matric	73	150	223
	Intermediate	25	63	88
	Bachelor	19	35	54
	Master/post graduate/ professionals	21	31	52
	Total	277	623	900

Table 4: Association of age, parity, occupation, education of women / husbands to contraceptive practices.

Variable	Level /Range	CP +	CP-	Chi-Square	OR+95%CI	p-value
Age	>35 years	97	124	23.64	2.168, 1.581-2.973	p<0.0001
	<35 years	180	499			
Parity	>5	87	100	27.47	2.4, 1.718-3.33	p<0.0001
	<5	190	523			
Occupation	Working women	21	22	6.91	2.24, 1.2-4.14	p<0.01
	House wives	256	601			
Educational status	Matric and above	65	90	10.94	1.8, 1.27-2.59	p<0.001
	Below matric & uneducated	212	533			
Husband's educational status	Matric & above	138	279	1.96	1.22, 0.92-1.62	p= 0.162
	Below matric & uneducated	139	344			

*CP+ contraception practicing, CP- contraception not practicing, OR odds ratio, CI confidence interval

pondents are described in Table 1. The mean age of the study population was 30.76 ± 7.641 years with mean age at marriage of 18.19 ± 2.982 years.

About 56.2% of the respondents had heard of some method, and the main source of their information were relative and friends (63.3%) in the informed group, followed by health personnel 25.7%, while for the remaining informed participants, source was either media or literature. Their attitude towards the contraceptive use is given in Table 2.

Table 5: Causes for the non-use of contraceptives (n=623).

Reasons	Frequency	Percentage
Desire for children	196	31.46
Pressure from husband	77	12.35
Prohibition by religion	68	10.9
Desire for son	63	10.11
Lack of awareness	44	7
Did not think about it	43	6.9
Pressure from mother in law	24	3.85
Herself didn't want	24	3.85
Fear of side effects	24	3.85
Husband is abroad	24	3.85
Lactational amenorrhoea	21	3.37
Non availability	15	2.4

Regarding the religious concern of the participants; 734 (81.6%) declared family planning as prohibited in the religion and hence a sinful act, 119 (13.2%) said that family planning was allowed in the religion while 47 (5.2%) gave no comments and were confused about the religious point of view for the use of contraceptive.

Of the respondents, 277 (30.8%) were practicing some method of contraception; while 623 (69.20%) were not using it. Traditional methods (withdrawal, rhythm method) was the commonest method of contraception 53 (5.9%), followed by injectable 48 (5.3%) and tubal ligation 46 (5.1%). 43 (4.8%) were using contraceptive pills, 32 (3.6%) condoms, 19 (2.1%) intra-uterine contraceptive device (IUCD) and 34 (3.8%) were using contraceptives in combinations. Only 2 (0.2%) used emergency contraceptive while none of them used contraceptive implants.

Table 6: Frequency of side effects with the use of contraceptives.

Side effects	Frequency	Percentage
No side effects	135	48.73
Menstrual disturbances	66	23.80
Change in weight	31	11.19
Other effects(infections, backache, feeling of guilt, etc)	26	9.38
Behavioral disturbances	19	6.8
Total	277	100

The use of contraceptives was more common in grand multipara ($p < 0.0001$), >35 years old ladies $p < 0.0001$, working $p < 0.01$ and those having education up to matric and above $p < 0.001$. In the respondents whose husbands were more educated the use on contraceptives did not show any significant difference from those whose husbands were not educated ($p = 0.162$). (Tables 3 & 4)

Non-user of contraceptive in this study were 623 (69.2%) and the major reasons for the non-use were, intentions to have more children 196 (31.46%), followed by pressure from the husband 77 (12.35%), prohibition by the religion 68 (10.9%) and desire for son 63 (10.11%). Non availability of contraceptive was the least common (2.4%) cause for not practicing contraception. (Table 5)

Among the 277 contraceptive users, 141 (50.95%) experienced side effects with the use of contraceptives. The commonest side effects were menstrual irregularities 66 (23.8%), followed by change in weight 31 (11.19%). (Table 6)

DISCUSSION

Child birth is the leading cause of death among women of reproductive age as one in five women of reproductive age die due to child birth related complications.³ Realizing this fact, as well as considering other benefits, family planning program in the public sector of Pakistan was incorporated in 1960 but still the CPR of 30% is highly discouraging. In comparison, the CPR of neighboring countries are quite high as 56% in Bangladesh and India while 68% in Srilanka.¹ In spite of the fact that more than 3000 family planning centers are working in the country, population growth rate is still 1.57.¹³ According to Pakistan Demographic & Health Survey, maternal mortality can be reduced by 36% if CPR goes up to 55%.³ Despite almost 3 folds increase of contraceptive use since last 20 years, 25% of the currently married women have an unmet need of family planning services.¹⁵

Literacy rate in this study was very low. About 62.2% respondents were totally uneducated and another 20% had only primary and middle education. This figure is contradictory to study by Inamullah et al¹⁶ and this level of illiteracy may not reflect the true situation. Because our study was conducted in government hospital where usually poor people seek medical treatments who are mostly uneducated. Condition may be further deteriorated by the internally displaced people from nearby Parachinar, Hungu and Orakzai Agency.

Mean age of marriage in our study was about 18 years. Same has been reported by PDHS.³ Con-

traceptive use in teenagers is less in our study supporting the work of others.¹⁷ In Pakistan, marriage is a social and religious obligation. Once marriages are consummated, they remain stable. Divorce and separation are socially discouraged in our country. The length of time women are exposed to the risk of childbearing affects the number of children woman potentially can bear. So, an increase in the age of marriage or the use of contraceptives in the teen age can play a vital role in reducing fertility level because it reduces the period of exposure to child bearing.

Awareness and knowledge of different contraceptive methods is the key to choose different contraceptive and to practice them. Although most of the respondent of this study knew about at least single method but there is a wide gap between the knowledge and practices. Commonly used methods were traditional, injectable and female sterilization which is different from the work of Seema et al⁷ while supported the work of Solomon Avidime et al.¹⁸ The use of emergency contraception in our study is very low 0.2% (n-2) which reflects their literacy level and their knowledge regarding this method. In contrast, 32% practices of this method have been reported from Ethiopia.¹⁹

The main source of information of the respondents regarding contraceptive were relative /friends followed by health workers. Same were the findings of Omo-Aghoja et al from Nigeria in 2009 while another local study claimed media as the main source of information.^{20,21}

While enquiring regarding their religious opinions, more than 80% declared it a sinful act. This fact may prevent them from the use of modern contraceptives. In the continuation, the 3rd major side effect after menstrual irregularities and weight changes was the feeling of guilt with the use of contraceptives which reflects their religious opinion regarding contraception. Learned and authentic scholars should play their role to clarify the minds.

Multipara, older, working and educated woman of this study practiced contraceptives mostly, which is in the line of other study.²²

Current contraceptive use in this study is 30.8% which is comparable to other Pakistani studies,^{7,15} but lesser than the rate reported by Shirmeen et al from Karachi.²³ Though it is more than double the rate observed by Adeniran et al.²⁴ Relationship of low CPR with poverty and illiteracy is a well documented fact. Our results confirmed this fact which further supported the work of Shabana and Martin Bobak¹³ and consistent with most of the literature from South Asia and elsewhere.²⁵⁻²⁹ Desire for more children, pressure from the husband and religion were the main reasons

for the non users reflecting the culture, historical background and typical male dominant society of district Kohat.

The higher level of husband education did not affect the usage of contraceptive significantly ($p = 0.162$) in our study which contradicts the work of Tasnim and Rana Ejaz.⁹

Having more sons was another important cause for the non-users as also reported by others.⁹ Religion has been identified to play a significant role in decision to use contraception. Muslims tend to have higher disapproval rate for contraception.³⁰ Therefore religious scholars should be involved to make it clear that family planning is not sinful and rather beneficial to them.

Positive correlation was observed between age, parity, female occupation and education and contraceptive practices which are similar to other Pakistani study.³¹ Husband education is the most dominant determinant for the use of contraceptive in the work of others¹⁷ though no statistically significant difference was noted in our study.

The disappointing finding of the survey was that the commonest method of contraception was traditional, further supporting the report of PDHS³ which observed condom and tradition methods as the commonest. Community practices and cultural beliefs play significant role in decision making vital to women's reproductive health. For example, certain aspects of our culture strongly discourage the use of modern contraceptives. They believe that those who use modern family planning methods are interfering with nature and they may be punished with infertility on re-incarnation. Same has been reported by Lawrence in 2009 from Nigeria.²⁰

CONCLUSION

Frequency of contraceptive use is comparatively low in our set-up despite high level of awareness. Desire for larger family, pressure from the husband, religious concerns and fear of side effects are the main factors that contribute to contraceptive non-use.

There is a need to improve the educational status of the females to improve their understanding and uptake of modern contraceptives. Teen age contraception should be encouraged. Religious scholars must play their role in clarifying many aspects regarding contraceptives.

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