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Contraceptive Preferences

# CONTRACEPTIVE PREFERENCES AND IMPROVED QUALITY OF LIFE

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## **ABSTRACT**

*Objective:* To understand the contraceptive preferences of women of reproductive age group and to know from where they get the knowledge of it and how quality of life of contraceptive users and non-users is affected. *Study Design:* Cross-sectional study.

*Place and Duration of Study:* Gynecology and Obstetrics department, Pak-Emirates Military Hospital Rawalpindi, from Sep 2017 to Aug 2018.

*Methodology:* Pre-tested self-administered questionnaires were used to assess the usage of contraception, role of health care providers social/family influences, and print/broadcast media, to provide sample size calculation, ethics approval, knowledge and access to various contraceptive methods. The quality of life indicators used were anemia and feeling of general well-being.

Results: A total of 1050 participated in the study. Out of those who have knowledge, only 497 (47.33%) practiced contraception and 530 (50.47%) not using it 23 (2.1%) were not clear about their views regarding contraceptive usage. Out of those who were using contraception, 161 (54.20%) women used barrier methods, 93 (18.71%) used intrauterine contraceptive devices, implanon 52 (10.46%), natural methods 61 (12.27%), oral/injectable 99 (19.91%) and male contraception was used by 31 (6.23%) couples. Anemia was less in contraceptive users 84 (17%) as compared to non-users 164 (31%).

*Conclusion:* Family planning is the strongest tool which can improve the health of mother and children as well as it's a development indicator for overall social and economic status of a society. By understanding its prevalence and factors influencing its usage, maternal and child health can be improved in near future.

Keywords: Anemia, Contraception, Contraceptive uses, Contraceptive methods, Factors, Health care professional.

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### INTRODUCTION

Contraceptive care is arguably the most sensitive area of medical decision-making, and is a public health priority. In the United States, approximately almost half of pregnancies are unintended, and the low use of contraception in general, and of highly effective contraceptive methods in particular, is a major contributor to the dismal state of this public health indicator<sup>1</sup>. On average, women in low and middle income countries have far more pregnancies than women in high-income countries, and therefore increasing their lifetime risk of death due to pregnancy related complications<sup>2</sup>. An estimated over 3 lakh women lost their lives during and following pregnancy and childbirth in 2015 and one third of these deaths were reported in South Asia<sup>3</sup>.

Fertility transition started around 1990's in Pakistan, Less than 10% practiced contraception and fertility rate was 5.3 per woman. All around the globe in most of the countries, population has been stabilized but Pakistan is still fighting with the control of fast-growing population. The estimated population of Pakistan is 162.4 million and by 2050 it will be 295

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million<sup>4</sup>. In order to keep a balance between population explosion and socioeconomic growth there is a dire need to improve and provide easily accessible and affordable family planning services. Despite of improved, affordable and accessible family planning services there is still slow uptake of services<sup>5</sup>. Against almost universal contraceptive awareness, overall contraceptive prevalence is reported to be at 29.6%; while, the use of modern contraceptive methods is reported to be even lower at 21.7%. Moreover, almost half of currently married women have used contraceptives (modern or traditional methods) at one time, indicating that a significant share of women have discontinued use of family planning<sup>6</sup>.

It was found that independent of economic development the factors which influenced use of contraception were cultural believes and traditions. Women get greatly influenced by their peers, family members, religious believes and traditions<sup>7</sup>. Women should be aware of the fact that they have right and opinion to decide the size of family. Multimedia can play an important role in educating couples and their families. Many advertising campaigns sponsored by private or public agencies disseminate health, nutrition, and product information aimed at changing people's beha-

viors. Such information about issues reaches its goal only if individuals obtain the disseminated information and transform the acquired information into new behaviors.

This would improve growth rate and help in economic stabilization of country<sup>9</sup>. The purpose of this study was to look into the contraceptive prevalence in women in army setups and to rule out factors involved in usage or non-usage of family planning services in order to bring changes to improve methods. As well as providing information, education and easy access to contraceptive methods.

### **METHODOLOGY**

This cross-sectional study was conducted in Gynecology and Obstetrics department at Pak-Emirates Military Hospital, Rawalpindi, from September 2017 to August 2018. After approval from institutional review board ER/65 dated July 2018, a total of 1050 patients were included in study by using Open Epi Calculator. Contraceptive prevalence rate in Pakistan is 37%10. Patients in reproductive age group (20-35 years) with ≥3 children and no medical risk factors as well as willingness to give information, were included. Women with history of infertility, bad obstetrical history and perimenopausal were excluded. Purposive sampling was done and a pre-tested self-administered questionnaire was used to get information regarding usage or non-usage of contraception. Face to face interviews were carried out with client in privacy to fill the survey forms. In order to gain more reliable data, before the interview, the family planning worker and the specialist encouraged the client to provide honest responses. On average, each interview asking the questions from questionnaire took 20 minutes. The participant survey included questions about their demographic characteristics, their preferences in contraception use, factors affecting their choice of usage or non-usage of contraception. Measures were taken to ensure the quality of collected data. All the forms were checked for completeness, logical errors, unclear or irrelevant responses on daily basis. Monitoring visits were also made by the Principal investigator to ensure quality of data and adherence to study protocol. The data entry was done by a different consultant to keep the processes unbiased. The software also restricted for the must filled entries and extreme values. Double entry was performed by two different operators and validated. Data was collected and analyzed using SPSS-20. Frequency, percentages were calculated, p-values calculated by chi-square test and t-test where appropriate.

#### **RESULTS**

One thousand fifty patients participated in study. The mean age of patients was 29.56 years, (R = 20-35). The educational status of women was primary in 40 (4%), middle 294 (29%), matric 360 (35%), FA/FSC 127 (13%), Bachelors 62 (6%) and Masters in 30 (3%) Parity of women was, as shown in table-I. Out of 1050 women interviewed 497 (47.33%) women used contraception and 530 (50.4%) didn't use any contraception. Women who used<sup>2</sup>.

Table-I: Obstetrical history.

Parity	n (%)
P0	30 (2.85)
P1	153 (14.57)
P2	327 (31.14)
P3	246 (23.42)
P4	181 (17.23)
P5	75 (7.14)
P6	38 (3.61)

Table-II: Source of information.

Source	n (%)
Tv/media	110 (22.1%)
Medical service provider	153 (30.07%)
Social/peer	234 (47.08%)

Table-III: Method used.

Method Used	n (%)
Oral/injectable	99 (19.91%)
Intrauterine device	93 (18.71%)
Natural method	61 (12.27%)
Barrier method	161 (54.20%)
Male contraception	31 (6.23%)
Implanon	52 (10.46%)

Out of 530 (50.4%) women who didn't use contraception the reason was social in 293 (55.2%) women, self-issues 153 (28.8%) women and medical reasons in 84 (15.8%) women. It was also found that women who didn't use any sort of contraception had low hemoglobin levels as compared to those who were use contraception and mean Hemoglobin was 10.07g/dl, *p*-value =0.01 by applying chi-square, shown in table-III. The women who were using contraception for birth spacing had better quality of life in terms of good hemoglobin levels 350 (70.4%) and general feeling of well-being 462 (92.95%).

It was found that those patients who got information through TV/Media mostly used natural methods 61 (55.4%) and 49 (44.5%) used oral contraceptives. Those who went to service provider used barrier methods 75 (49.5%), injectable 25 (16.3%), intrauterine device 52 (33.9%) and oral contraceptives in 24 (15.6%). Those who got information through peers/social used

Implanon 52 (22.2%), male contraception 31 (13.2%), barrier methods 86 (36.7%), intrauterine device 41  $(17.5\%)^2$  and 25 (10.6%) used barrier methods.

The comparison between contraceptive and non-contraceptive users showed differences in quality of life i.e. feeling of wellbeing and normal hemoglobin levels, *p*=value=0.01 calculated by chi-square. The rate of contraceptive use was more in educated women 230 (46.27%) as compared to non-contraceptive users.

Table-IV: Hemoglobin levels.

Pakistan has one of the highest fertility rates and lowest contraceptive use rates among all of its neighbor's <sup>13</sup>. The average contraceptive prevalence rate (CPR) in South Asian countries is 53% (2013) while Pakistan has the lowest rate at 35% <sup>14</sup>.

Social/peer influence was more prominent factor in seeking contraception. The influence of the mother in law is still voiced as a challenge at the household level. The underlying reason is considered to be rooted

Hemoglobin Levels	Minimum	Maximum	<i>p</i> -value
Contraceptive user	10.9gm/dl	14.1gm/dl	0.02
Non-Contraceptive user	7gm/dl	10.7gm/dl	

### **DISCUSSION**

Family planning is considered as essential to the achievement of Millennium Development Goals because of direct impact of family planning on women's health and consequence of each pregnancy. The use of modern contraception among Asian women is less than global average. In Asia a majority of unintended pregnancies are due to using traditional contraceptive or no methods which lead to induced unsafe abortion. Cultural attitudes, lack of knowledge of methods and reproduction, socio demographic factors, and health service barriers are the main obstacles to modern contraceptive practice among Asian women<sup>11</sup>. The results of this study showed that women had different preferences for contraceptive usage moreover, the source of information was also different. Overall these findings support the evidence that exists in literature showing that the content of counseling was important to women. Many women preferred to get both verbal and written information about contraception in the visit, with many women also indicating comfort with receiving information on the Internet. According to an online survey it was found that, women felt consultation with a provider as crucial, few participants felt that verbal instruction was sufficient given the quantity of information being provided about different contraceptive methods<sup>12</sup>.

Pakistan is a populated country with growth rate of 1.9% per annum. During past three decades developing world has shown marked changes in contraceptive trends with increased knowledge of contraceptive methods resulting in more than half of married women using contraception. The key factors in rise are information distribution, access to contraceptive methods, rapid expansion of family planning programs, desire to reduce family size and social/economic changes.

in different mind sets within the family dynamics such as, mother in law, who was less inclined to use contraceptives themselves tend to influence their sons and daughter in laws to do likewise; if the husband is the only son and families where there is a desire for a son due to the birth of more daughters. Our study findings are consistent with findings from previous studies in Pakistan and neighboring countries<sup>15</sup>.

Medical service provider and media had a prominent role in effecting women decision to use contraception. Media, social factors and care providers play an important role in contraceptive usage and trend<sup>5</sup>. Moreover, multimedia was also effective mode of information regarding family planning services in our study, as previously also women considered media as an influential factor and contraceptive prevalence rate was 32% <sup>16</sup>.

Barrier method was quite prominent whereas, male contraception was least used. In conservative societies like Pakistan male contraception was not considered appropriate<sup>17</sup>. Male engagement in counseling is an area not effectively addressed by the program structure. Whereas, in many societies men were willing to share responsibility in a stable relationship after achieving desired family size<sup>18</sup>. Intrauterine devices were used which showed more awareness regarding long term contraceptive methods and more use of LARC, contrary to study carried out in North America which showed LARC user number was less despite of more awareness<sup>19</sup>. Those who didn't use contraception social factor was most prevalent which strongly support evidence provided in literature that mother in law role, husbands desire for more children, accessibility to family planning services and educational status of couple proved barrier to contraceptive use<sup>20</sup>. Women may be willing to postpone the pregnancy but they may be constrained by a range of social, cultural, and supply side factors to take specific action that actually leads to post-ponement of the pregnancy<sup>21</sup>. Religious and cultural trends were major influential factors which should be addressed which have the potential to influence the acceptance and use of contraception by couples in very distinct ways<sup>22</sup>. The effect of partners' education on women's and children's health in developing countries has received relatively little attention to date<sup>23</sup>.

In low- and middle-income countries, anemia is a major public health issue in women of reproductive age for a series of factors including iron deficiency. The current and continuous use of oral contraception was of benefit against anemia, with the risk for anemia decreasing<sup>24</sup>. In our study women who were using contraception had hemoglobin higher than those who didn't use it providing valuable information for policy makers, family planning staff and clinicians working in low and middle income countries in efforts to control anemia. The goal of this study was to help shape future research and design programs to meet women's needs for quality family planning care. It provided guidance for contraceptive counseling research and practice regarding contraceptive decision making, interpersonal relationships and information provision.

## LIMITATION OF STUDY

This study was carried out at only one military set up, future recommendation is to include maximum number of military hospitals as well as civil set ups to look into the contraceptive preferences, usage and effect on overall health of women getting treatment from these hospitals.

### **CONCLUSION**

Family planning helps women to decide when to get pregnant and help them in birth spacing. It prevents ill-timed and closely spaced pregnancies which invariably effects women health and mental wellbeing. In our study contraceptive of choice by women was barrier methods followed by hormonal methods. Moreover, quality of life indicators anemia and feeling of general well-being were better in contraceptive users. Organized family planning efforts addresses specific family planning needs of women with distinct social, economic, and personal characteristics as revealed in the present study.

#### CONFLICT OF INTEREST

This study has no conflict of interest to be declared by any authors.

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