

Research Article

Contraceptive Use and its Trends in Rural Areas of Punjab

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Abstract

Contraception is the need of hour particularly in developing countries like Pakistan whose major crisis now-a-days is overpopulation, unachieved desired fertility rate and limited resources.

Objective: The objective of this study was to explore the trends in the choice of contraceptive methods and method preference in various age groups among females.

Methods: This Cross-Sectional study was conducted by using Basic Health Unit 14/1AL Renala Khurd, s Outdoor Patient Department database retrospectively. Non-probability Convenient sampling technique was used and all the females that sought advice regarding contraceptives from 1st January 2017 to 31st March 2017 (3 months) were included in the research and none were excluded.

Results: Out of 460 females who visited the BHU to seek medical advice regarding use of contraception, 33 were already using some type of contraception and 427 came for the first time. Upon studying age distribution, 217 females (47.2%) were between 21-30 years of age, 218 females (47.4%) were 31-40 years old, 11 females (2.4%) were 20 years or below and 14 females (3%) were above 40 years. After consultation with the doctor at the family planning clinic, 170 females (38.7%) opted for combined oral pills, 159 (34.6%) chose condoms, 77 (16.7%) chose (DMPA) injection, 38 (8.3%) chose Copper T 380A IUCD, 8 females (1.7%) chose tubal ligation. None of the females chose progesterone only pill, Copper 375 IUCD, subdermal implant or vasectomy. After cross tabulating various methods opted for contraception with age groups of females, chi-square test was applied and a significant correlation was seen between these two with a p-value of 0.000

Conclusions: Awareness, availability, affordability, easy access and age of the female partner play a major role in the choice of contraceptive. Hence emphasis should be paid on public awareness and easy availability of these facilities in remote rural areas.

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Introduction

The improving access to contraception and reduction of the unmet need for family planning are the necessary elements in improving reproductive

health, but the outcome monitoring is hindered by the scarcity of data along with the variations in data sources.¹ Contraception being the intentional and planned prevention of conception is also now a days being used under the term family planning². Family

planning in fact is the way of living adopted by couples, using different methods of contraception, depending upon their knowledge and attitude, for their social and economic welfare and also for the development of their country. Contraception is designed to interfere at various sites the normal process of ovulation, fertilization and implantation.

Various natural methods of contraception have been used for centuries³ whereas the recent advances in this field has equipped us with numerous reversible and irreversible options⁴. Moreover, family planning gives each individual the right to determine the number of children and reduces the rate of abortion in the community thus it plays its role in reducing maternal and neonatal mortality rate.⁵

Contraception is the need of hour particularly in developing countries like Pakistan whose major crisis now-a-days is overpopulation and limited resources. There is a massive decline in the health system of Pakistan because of high fertility rate that is likely to get doubled to around 260 million⁶ people over the next two decades. No doubt, in the past few years, government has introduced many programs regarding family planning but still the desired fertility rate has not been achieved.⁷ The awareness about contraception in rural population of Pakistan⁸ has a direct relation with the rapidly increasing population of rural areas.⁹ Proper guidance of spouse about family size and contraception by using all the reliable resources efficiently and effectively should be the prime focus.

Basic health units (BHUs) are an important part of primary health care which are playing their significant role in providing awareness about family planning and contraception among people of rural areas. Around 2456 functional BHUs exist across Punjab.¹⁰ Lady health worker program introduced in early 1990's¹¹ has improved the level of awareness among females but still the results are quite below the expectations.

This study has been conducted in a BHU near Renala Khurd, district Okara having a population of 53,473 comprising mostly of rural areas where population growth rate is 3.41%.¹² This study has been designed to determine different methods of contraception that are being opted by females of different age groups in this area. The data collected from this facility over a

period of three months will help to understand the preference of females regarding reversible and irreversible methods of contraception and ultimately it will be helpful to create different and effective policies for the better utilization of health care resources. This study will inform policy makers about the current pattern of contraceptive choices in the BHU which can be used to plan educational campaigns for couples of different age groups in the rural areas.

Methods

It is a Cross-Sectional study using Basic Health Unit 14/1 ALRenalaKhurd's Outdoor Patient Department database retrospectively. Secondary data was used from the standard OPD register of the BHU for patients coming for antenatal checkup and contraception. The preference of various reversible as well as irreversible contraceptive methods was studied. The data was collected with complete confidentiality, and permission from the concerned authority (Deputy District Health Officer) was obtained prior to the process. Non-probability Convenient Sampling was used and all the females that came for antenatal checkup and sought medical help regarding contraceptives from 1st January 2017 to 31st March 2017 (3 months) were included in the research and no patient was excluded. Chi-square test was applied to check the significance of association between age group of females and method of contraception opted. SPSS 21 was used for data entry and analysis.

Results

A total of 1700 patients visited the facility in the 3 months period and out of 1700 patients 460 females visited the BHU to seek medical advice regarding the use of contraceptive. Out of these 460 females 427 came for the first time whereas 33 females had prior history of visit and contraceptive use Fig 1

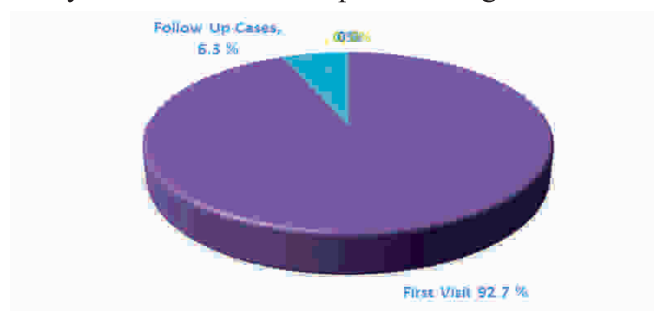


Fig.1 First time contraceptive user v/s follow-up cases

217 females (47.2%) were between 21-30 years of age where as 218 females(47.4%) were 31-40 years old comprising most of our sample. 11 females (2.4%) were 20 years or below and 14 females (3%) were above 40 years.

Out of 460 couples, 170 (38.7%) opted for combined oral pills, 159(34.6%) chose condoms, 77 couples (16.7%) chose depomedroxyprogesterone acetate (DMPA) injection, 38 couples (8.3%) chose Copper T 380A intrauterine contraceptive device, 8 couples (1.7%) chose tubal ligation. None of the couples chose progesterone only pill, Copper 375 IUCD, subdermal implant or vasectomy although all these facilities were available at the BHU. (Fig.2)

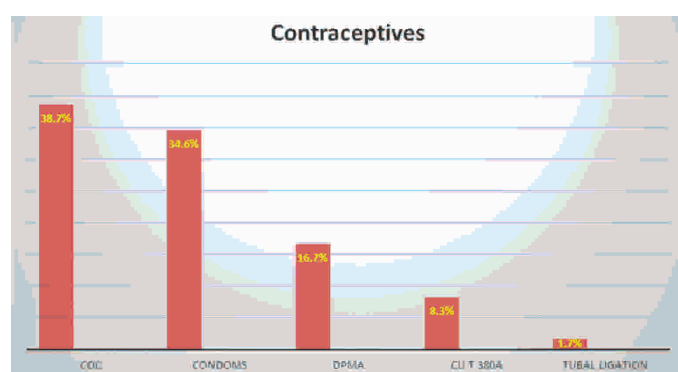


Fig.2 Individual percentages of contraceptives opted

In order to determine the preference of contraceptive compared to age of the female contraceptive choices were cross tabulated against various age groups. The results showed that DMPA was preferred by females who were 20 years or younger (5 out of 11) whereas COC pills were preferred by females between 21-30 years age (92 out of 217). In females belonging to the age group 31-40 years condoms were preferred (83 out of 218) whereas in above 40 years category condoms and tubal ligation were preferred equally (5 each out of 14) Fig 3

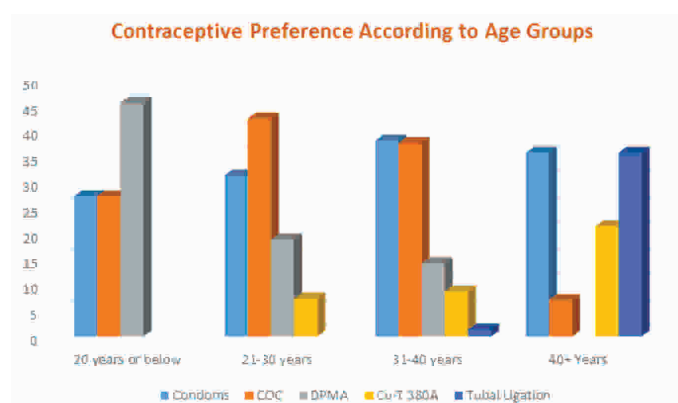


Fig.3 Preference of contraceptives in different age groups of females

After cross tabulating various methods opted for contraception with age groups of females, chi-square test was applied and a significant correlation was seen between these two with a p-value of 0.000

Discussion

This 3 months study conducted at Basic health Unit 14/1AL Renala Khurd significantly shows the trend in the use of contraceptives in the couples presenting at the health care facility. The study also highlighted the various contraceptive facilities available in rural areas and also the preference and level of utilization of these contraceptive facilities. Being the first point of contact between the doctor and patients the basic health units play a vital role in the initial management of various diseases as well as the preliminary counselling of couples about family planning and contraception.

Renala Khurd is located 18 Km from Okara¹² so due to this reason the local population of the areas do not get to enjoy the tertiary care facilities at their door step. This is where the role of Primary health Care facilities comes into play. The closer the facility is to the patient the better is the patient compliance to the treatment¹³. As multiple BHUs and RHCs exist in the area¹⁰, if emphasis is paid on provision of major health care facilities like contraception at this level, the growth rate as well as the rate unsafe abortions and sexually transmitted diseases can be reduced.¹⁴ The average 3 months patient load of the BHU when calculated came around 1700, out of which only 460 came for help regarding contraceptives. This is less than one fourth of the total patients.

When calculating the figures related to first time visit for contraceptive use and follow-up visits it was seen that only 6.3% of cases were follow-up cases. This number needs to be increased as multiple sessions of counselling with a doctor helps to increase the doctor-patient trust⁸ and also the outcomes are better⁷. On the other side the number of new comers to seek contraceptive advice is a positive sign because it indicates that couples have started to think about contraception.

Majority of couples that visited the BHU to seek medical advice regarding contraception, the age of female partner was between 21-40 years constituting 94.6% of the total cases. This thing can be justified with the medical fact that the major part of child

bearing age of females lies within this range¹⁵. 11 females were 20 years old or less which indicates that young couples are seeking medical advice related to contraception and family planning which is again a positive sign but the less number can definitely be justified by the fact that the trend of early marriages which used to be relatively more in developing countries is gradually decreasing now¹⁶. As far as the lesser number of females in the 40+ category is concerned the fact is obvious that this is the age of menopause¹⁷ and hence the need for family planning and contraception diminishes with increasing age¹⁶.

When analyzing the method of contraception opted by the couples it was seen that majority of our subjects (38.7%) chose combined oral contraceptive pills. The finding definitely goes according to the worldwide trend of choice of contraceptive method¹⁸. Male condoms were the second most opted method of contraception. Considering the cost effectiveness, easy use and minimal side effects¹⁹ the finding is quite valid. Injectable and intrauterine contraceptive devices were also chosen but the percentage is quite less. The finding about the use of terminal methods of contraception was notable. Only 1.7% of our subjects opted for terminal method of contraception and that too by tubal ligation. Whether it's due to the fear of minor surgical procedure or lack of awareness but this thing needs to be studied as after the completion of family tubal ligation has a protective role against ovarian cancer^{21,20} and is also mentally and physically beneficial.²¹

The cross tabulation of various methods of contraception opted by the couples against the age group of female partner gave quite significant results. The choice of contraceptive method used varied in different age groups. In the late teen age injectable DPMA was the most opted contraceptive method whereas condoms and combined oral contraceptive pills were the second most opted method in that age group. In the age group of 21-30 years most couples opted for combined oral pills and condoms were the second on the list. In the age group 31-40 years condoms were the most chosen option. In the 40 plus category there were only 14 subjects and condoms and tubal ligation were equally chosen. Cases of tubal ligation being opted were seen after 31 years of age that can be easily justified by the fact that this method is used after the completion of family²⁰. Hence a

significant relationship was seen between the age group of female partner with the method of contraception opted.

The study strikingly shows significant findings that can be used to target the approach of health care professionals towards family planning and contraception. Benefits, side effects and other details of each method of contraceptive definitely influence their choice whereas the choice of contraceptive also differs with increasing age of female partner.

There are some limitations to this study. As data used was from a single Basic Health Unit, so its findings cannot be generalized to the whole population. Such studies need to be conducted at a larger scale by using data from multiple centers, so that the findings may be generalizable. Another limitation is the use of secondary data. Further research with the use of primary data on the same topic may show a better picture of the trends in contraceptive use.

Conclusion

Awareness, availability, afford ability, easy access and age of the female partner play a major role in the choice of contraceptive. Hence emphasis should be paid on public awareness and easy availability of these facilities in remote rural areas so that the problems like overpopulation, unsafe abortions and sexually transmitted diseases may be overcome that would save a lot of man power and resources unjustifiably utilized on them.

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Conflict of Interest: None

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