

## Original Research Article

# Awareness and contraceptive practices among reproductive women in an urban area, Telangana, India: a cross-sectional study

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## ABSTRACT

**Background:** Current world population is 7.6 billions and India accounts 1.3 billions, India is the second most populous country in the world, by 2050 the world's population is expected to reach 9 billion. Family Planning can have a positive impact on population growth, maternal mortality, and infant and new-born outcomes. Hence there is a need for considerable improvement in coverage and quality of family planning services. The objective of the study is to assess the awareness and contraceptive practices among womens.

**Methods:** This cross-sectional study was conducted in an urban health-training center area of Rangareddy district, Telangana state. The study participants involved were women of reproductive age group 15–45 years. 200 women were selected by simple random sampling technique. Data entry was done in Microsoft excel and analyzed using SPSS version 20.

**Results:** In this study 50% women belong to 26-35 year age group. 64% were literate, 41.4% belong to upper middle class, 74% women's source of information regarding contraceptives is from medical professionals. 61% women are aware of contraception and 34% practice it.

**Conclusions:** Based on our observation, 60% women were aware of contraception but only 34% practice at least one method. The common reasons for not practicing contraception are lack of knowledge, the desire for male child, pressure from husband. This study concludes that factors like age, education, socio-economic status have significant impact on awareness and practice of contraception.

**Keywords:** Family planning, Unmet needs, Awareness, Practices

## INTRODUCTION

The current world population in 2018 is 7.6 billion, the projected population by 2050 is 9.9 billion. India accounts to be the second largest populous country with 1.37 billion population. By 2050 India's population is expected to reach 1.6 billion to be the first populous country in the world.<sup>1</sup> India is the first country to launch a nation-wide family planning programme in 1952.<sup>2</sup> Family planning and health have a two way relationship. Family

planning is considered as an effective way to reduce maternal mortality, morbidity of women of child bearing age, foetal and neonatal mortality.<sup>3</sup>

According to NFHS-4 total fertility rate in India is 2.2% and Telangana state is 1.8%. Total unmet need for family planning in India is 12.9%.<sup>4</sup> The most common reasons for unmet need are inconvenient or unsatisfactory services, lack of information, fear about contraceptive side effects and opposition from husband or relatives. Moreover, a large proportion of Indian population reside

in urban slums and rural areas where poverty, misconceived religious notions, social customs, illiteracy, ignorance and superstitions prevail.<sup>5</sup>

This study was conducted with an objective to know the socio-demographic profile and to assess the various factors influencing the awareness and contraceptive practices in colonies of urban field practice area for considerable improvement in coverage and quality of family planning services.

## METHODS

This community based cross-sectional study was conducted in an urban health-training center area of Rangareddy district, Telangana state, India which is a field practice area under Kamineni Academy of Medical Sciences and Research Centre, department of Community Medicine, during the months from August to October, 2018. The study participants involved were the women of reproductive age group (15–45 years). Out of 18 colonies under UHTC, 2 were selected by lottery method (namely Bal reddy Nagar and Himapuri colony) and by simple random sampling method 100 women were selected from each colony. Informed verbal consent was taken from the study participants prior to start of study.

### Inclusion criteria

Women of reproductive age group (15-45 years) and who gave informed consent for the study participation.

### Exclusion criteria

Women who were not willing to participate in the study. Sick and guest women.

### Data collection procedure

Data was collected by a predesigned pretested questionnaire by adopting interview technique. Questionnaire had questions pertaining to socio-demographic information, awareness and practice of contraception.

### Statistical analysis

Data entry was done in Microsoft excel 2010 and analyzed using SPSS version 20. Statistical association was done using chi-square test wherever necessary with  $p < 0.05$  considered as statistically significant.

## RESULTS

A total of 200 women of reproductive age group (15-44yrs) participated in the study. Majority of them belong to the age group of 26-35 (50%). A large proportion of subjects belong to Hindu religion (83%). Out of 64% literate women, most subjects of the study population had completed middle school education (26%). Almost all

(90.2%) were married and majority (74%) of were housewives. According to modified BG Prasad classification it was observed in this study that most of the participants were showing SES as Upper middle class (41.46%) and lower-middle class (37.8%), followed by upper class (13.41%), and the least participants belonged to the upper lower class (7.6%) (Table 1).

**Table 1: Distribution of study subjects by socio-demographic variables.**

| Variables                    | Frequency | Percentage (%) |
|------------------------------|-----------|----------------|
| <b>Age (in years)</b>        |           |                |
| 15-25                        | 61        | 30.48          |
| 26-35                        | 100       | 50             |
| 36-45                        | 39        | 19.52          |
| <b>Religion</b>              |           |                |
| Hindu                        | 166       | 83             |
| Christian                    | 20        | 9.7            |
| Muslim                       | 14        | 7.3            |
| <b>Education</b>             |           |                |
| Illiterate                   | 70        | 36             |
| Primary                      | 28        | 14             |
| Middle                       | 53        | 26             |
| High school                  | 28        | 14             |
| Graduate                     | 21        | 10             |
| <b>Occupation</b>            |           |                |
| Housewife                    | 148       | 74             |
| Working women                | 52        | 26             |
| <b>Socio-economic status</b> |           |                |
| Rs. >6528 (upper class)      | 27        | 13.41          |
| Rs. 3264-6527 (upper middle) | 83        | 41.46          |
| Rs. 1959-3263 (lower middle) | 76        | 37.8           |
| Rs. 979-1958 (upper lower)   | 14        | 7.6            |
| Rs. <978 (lower)             | 0         | 0              |
| <b>Marital status</b>        |           |                |
| Married                      | 180       | 90.2           |
| Unmarried                    | 15        | 7.3            |
| Widow                        | 3         | 1.2            |
| Divorce                      | 2         | 1.2            |

The present study shows 61% were aware of at least any one of the family planning methods. The best known method of contraception was barrier method (70.7%) followed by sterilization (62%) and IUCD (42.6%). The knowledge about emergency contraception was quite low (4.5%). The source of information for family planning methods were mainly doctors/ multipurpose health worker (MPHW)/anganwadi worker (AWW) (74%). Majority of them were aware that contraceptives were available at Government Hospital (68.6%) and pharmacy (47.3%) (Table 2).

**Table 2: Awareness regarding various contraceptive methods (multiple responses).**

| Awareness                     | Frequency | Percentage (%) |
|-------------------------------|-----------|----------------|
| <b>Type of method</b>         |           |                |
| Any method                    | 122       | 61             |
| Barrier method                | 86        | 70.7           |
| IUCD                          | 52        | 42.6           |
| OCP                           | 22        | 18.3           |
| Sterilization                 | 75        | 62             |
| Injectables                   | 10        | 8.6            |
| Natural methods               | 16        | 13.4           |
| Emergency contraception       | 5         | 4.5            |
| <b>Source of information</b>  |           |                |
| Doctors/MPHW/AWW              | 90        | 74             |
| Brothers/sister/friends       | 14        | 12             |
| Mass media                    | 44        | 36             |
| Parents/elders                | 29        | 24             |
| No knowledge                  | 35        | 29             |
| <b>Source of availability</b> |           |                |
| Government hospitals          | 83        | 68.6           |
| Private hospitals             | 28        | 23             |
| Pharmacy                      | 57        | 47.3           |
| No knowledge                  | 34        | 28             |

**Table 3: Contraceptive practice among the study participants.**

| Practice                       | Frequency | Percentage (%) |
|--------------------------------|-----------|----------------|
| <b>Type of method</b>          |           |                |
| Not practised any method       | 131       | 65.5           |
| Barrier method                 | 19        | 9.5            |
| IUCD                           | 12        | 6              |
| OCP's                          | 4         | 2              |
| Sterilization                  | 31        | 15.5           |
| Natural methods                | 3         | 1.5            |
| <b>Reasons for using</b>       |           |                |
| Avoid unwanted Pregnancy       | 83        | 68.3           |
| Prevention of STD's            | 15        | 12.2           |
| Birth spacing                  | 31        | 25.6           |
| Improvement of MCH             | 10        | 8.5            |
| <b>Reason for not using</b>    |           |                |
| No knowledge                   | 78        | 59             |
| Desire for male child          | 23        | 18             |
| Pressure from husband          | 12        | 9              |
| Prohibition from religion      | 8         | 6              |
| Adverse effects on sexual life | 6         | 5              |
| No faith on contraception      | 4         | 3              |

**Table 4: Association between awareness and socio-demographic variables.**

| Variables             | Category              | Awareness        |                 | $\chi^2$ , P value | Inference                 |
|-----------------------|-----------------------|------------------|-----------------|--------------------|---------------------------|
|                       |                       | Present<br>N (%) | Absent<br>N (%) |                    |                           |
| Age                   | <30 years             | 83 (75 )         | 27 (25 )        | 21.47, <0.05       | Statistically significant |
|                       | >30 years             | 39 (43 )         | 51 (57 )        |                    |                           |
| Education             | Illiterate            | 24 (38 )         | 46 (62 )        | 37.36, <0.05       | Statistically significant |
|                       | Primary and middle    | 55 (67 )         | 26 (33 )        |                    |                           |
|                       | High school and above | 43 (88 )         | 6 (12 )         |                    |                           |
| Socio-economic status | Upper class           | 88 (80 )         | 22 (20 )        | 37.09, <0.05       | Statistically significant |
|                       | Lower class           | 34 (38 )         | 56 (62 )        |                    |                           |

(Upper class: upper and upper middle, Lower class: lower middle, upper lower, lower).

**Table 5: Association between education and practice.**

| Education             | Practice     |             | $\chi^2$ , p value | Test of significance      |
|-----------------------|--------------|-------------|--------------------|---------------------------|
|                       | Yes<br>N (%) | No<br>N (%) |                    |                           |
| Illiterate            | 14 (20)      | 56 (80)     | 31.84, 0.0000001   | Statistically significant |
| Primary and middle    | 22 (27)      | 59 (73)     |                    |                           |
| High school and above | 33 (67)      | 16 (33)     |                    |                           |
| Total                 | 69 (34)      | 131 (66)    |                    |                           |

We found that the most common contraceptive practice among the study participants was sterilization (58%),

followed by barrier method and IUCD 68.3% of participants knew that contraceptives were used to

prevent unwanted pregnancy and about 25.6% answered that they could be used for birth spacing. Only 12.2% were aware that they could be used to prevent STDs. The most common reason for not using contraceptives is due to lack of knowledge regarding various family planning methods (59%). The desire for male child, pressure from husband and prohibition from religion are commonly encountered responses in this study (Table 3).

Awareness of contraception in the present study is more among the study participants <30 years age group and it was statistically significant ( $p < 0.05$ ). It was noticed that awareness is higher among the participants exhibiting literacy status as high school and above and hence the association between awareness and literacy status was statistically significant ( $p < 0.05$ ). It was observed in this study that study participants belonging to upper class had more knowledge compare to lower class, statistically significant ( $p < 0.05$ ) (Table 4).

In this study the association between education and practice of contraception is statistically significant (Table 5).

## DISCUSSION

In the present study, majority of them belong to 26-35 years age group i.e., 50%. This similarity was noticed in the study done by Agarwal et al.<sup>6</sup> A large proportion of subjects belong to Hindu religion (83%), this is similar to a study conducted by Sherpa et al.<sup>7</sup> Out of 64% literate women, most subjects of the study population had completed middle school education (26%), similar findings were noted in a study conducted by Bedi et al.<sup>8</sup> Almost all (90.2%) were married and majority (74%) of them were housewives, this is similar to a study done by Santoso et al.<sup>9</sup> According to modified BG Prasad classification, it was observed in this study that most of the participants were showing SES as Upper middle class (class 2) (41.46%), this is contrast to a study done by Sindhu et al where 40% of women belong to class 3 socio-economic status (SES).<sup>10</sup>

In this study, 61% were aware of at least one method of contraception, this similarity was noticed in the study done by Sajid et al i.e., 60% and Khan et al mentioned it as 81%.<sup>11,12</sup> The best known method of contraception in the present study was barrier method (70.7%), whereas the knowledge about emergency contraception was quite low (4.5%), similar findings were noticed in a study done by Srivastav et al i.e., 88.78% knew about barrier method and 6.83% were aware of emergency contraception.<sup>13</sup> The source of information regarding contraception were mainly doctors/multipurpose health worker (MPHW)/anganwadi worker (AWW) (74%), which is similar to a study by Nabanita et al and Gupta et al.<sup>14,15</sup>

In present study, majority of them were aware that contraceptives are available at Government Hospital (68.6%) and pharmacy (47.3%) which is similar to study

done by Renjhen.<sup>16</sup> 68.3% of participants knew that contraceptives were used to prevent unwanted pregnancy, this similarity was observed in study done by Thapa et al.<sup>17</sup> The contraceptive practice in this study is 35%. In a study done by Iqbal et al, the contraceptive practice observed to be 41.6%.<sup>18</sup> The most common reason for not using contraceptives is due to lack of knowledge regarding various family planning methods, this is similar to a study done by Ramaiah et al.<sup>19</sup>

In this study, there was a significant association between Age ( $\chi^2=21.47$ ,  $p=0.000003$ ), educational status ( $\chi^2=37.36$ ,  $p<0.0000001$ ) and socio-economic status ( $\chi^2=37.09$ ,  $p<0.000001$ ) with awareness of contraception, which is similar to a study by Sindhu et al and Sherpa et al.<sup>7,10</sup> Thapa et al observed that there was statistically significant association of knowledge with education and total income of the family.<sup>17</sup> The association between education and practice is statistically significant, this is similar to study done by Gupta et al.<sup>15</sup>

## CONCLUSION

Based on the observation, 60% women were aware of contraception but only 34% practice at least one method. The common reasons for not practicing contraception are lack of knowledge, the desire for male child, pressure from husband. This study concludes that factors like age, education, socio-economic status have significant impact on awareness and practice of contraception. To bridge the gap between knowledge and practice, there is a strong need for health education and motivational strategies by health workers with the help of local leaders and NGO's to make people accept the methods.

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## REFERENCES

1. Population reference bureau. World population data sheet: with a special focus on changing age, 2018. Available at: [http://www.prb.org/wp-content/uploads/2018/08/2018\\_WPDS.pdf](http://www.prb.org/wp-content/uploads/2018/08/2018_WPDS.pdf). Accessed 9 September 2018.
2. World Health Organization. Family Planning in Health Services: Report of a WHO Expert Committee. Geneva: WHO, 1971. Available at: <http://www.who.int/iris/handle/10665/40917>. Accessed 9 September 2018.
3. World Health Organization. Family Planning in Health Services: Report of a WHO Expert Committee. Geneva: WHO, 1970. Available at: <http://www.who.int/iris/handle/10665/40917>. Accessed 9 September 2018.
4. International Institute for Population Sciences. National Family Health Survey (NFHS-4), 2015–16: India. Mumbai, India: IIPS. Available at:

<http://www.rchiips.org/nfhs>. Accessed 10 September 2018.

5. Park K. Park's Text book of Preventive and Social Medicine. 22nd edition. Jabalpur: M/s Banarsidas Bhanot Publishers; 2013: 562.
6. Agarwal M, Samanta S, Bhusan D, Anant M. Assessing knowledge, attitude, and practice of contraception: a cross-sectional study among patients in a semi-urban tertiary hospital. *Int J Reprod Contracept Obstet Gynecol*. 2017;6:720-4.
7. Sherpa SZ, Sheilini M, Nayak A. Knowledge, attitude, practice and preferences of contraceptive methods in Udupi district, Karnataka. *J Family Reprod Health*. 2013;7:115-20.
8. Bedi R, Sharma RK, Sharma S, Mehanda B, Chaudhary P. Knowledge, attitude, and practices of the community regarding family welfare service with emphasis on never users of contraception. *IOSR-JDMS*. 2017;16(10):20-5.
9. Santoso BI, Surya R. Knowledge, attitude and practice of contraception among pregnant women in Ende district, East Nusa Tenggara, Indonesia. *J South Asian Feder Obst Gynae*. 2017;9(2):110-8.
10. Sindhu BM, Angadi MM. Knowledge, attitude and practice about family planning methods among reproductive age group women in a tertiary care institute. *Int J Sci Stud*. 2016;4(2):133-6.
11. Sajid A, Malik S. Knowledge, attitude and practice of contraception among multiparous women at Lady Aitchison Hospital, Lahore. *Ann King Edward Medical University*. 2010;16(4):266.
12. Khan A, Hashmi HA, Naqvi Z. Awareness and practice of contraception among child bearing age women. *J Surg Pakistan*. 2011;16(4):179-82.
13. Srivastav A, Khan MS, Chauhan CR. Knowledge, attitude and practices about contraceptive among married reproductive females. *Int J Scientific Stud*. 2014;1(5):2-4
14. Deka N, Sarma AK, Borthakur S. Awareness and knowledge of contraception among parous women and contraceptive usage by them. *Int J Health Res Medico Legal Prac*. 2017;3(1):27-9.
15. Gupta V, Mohapatra D, Kumar V. Family planning knowledge, attitude, and practices among the currently married women (aged 15–45 years) in an urban area of Rohtak district, Haryana. *Int J Med Sci Public Health*. 2016;5:627-32.
16. Prachi R, Das GS, Ankur B, Shipra J, Binita K. A study of knowledge, attitude and practice of family planning among the women of reproductive age group in Sikkim. *J Obstet Gynecol India*. 2008;58:63-7.
17. Thapa P, Pokharel N, Shrestha M. Knowledge, attitude and practices of contraception among the married women of reproductive age group in selected wards of Dharan Sub-Metropolitan City. *J Contracept Stud*. 2018;3:3.
18. Malik ZI, Habib S, Rehman MZU. Contraceptive knowledge, attitude & practice among parous women attending gynae outdoor of Shaikh Zayed Hospital, Rahim Yar Khan. *Pak J Med Health Sci*. 2015;9(1):80–3.
19. Ramaiah R, Jayarama S. Contraceptive knowledge, attitude and practice among married women of reproductive age group in a rural area of Karnataka: a cross sectional study. *Int J Community Med Public Health*. 2017;4:1733-6.

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